McInnes, J. R
1942

The Brava and his educational problems in Marion, Mass.

THE BRAVA AND HIS EDUCATIONAL PROBLEMS
IN
MARION, MASSACHUSETTS

"Educating The Brava"

A Thesis Presented for the Degree of
Master of Education

by

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B. S. in Ed.

Boston University
1942

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ACKNOWLEDGEMENTS

I wish to express my sincere appreciation and thanks to Professor Herbert Blair, Professor of Education Boston University, for his keen criticism and guidance in the planning and execution of this study.

I am particularly indebted to Mr. John Glenn, Superintendent of Schools, Marion, Massachusetts and the Marion School Department for their helpful assistance in securing the data upon which this study is based.

Grateful acknowledgement and appreciation is extended to Miss Katherine Kenealy, for her many helpful suggestions and stenographic assistance.

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CHAPTER I

INTRODUCTION AND PURPOSE OF THE STUDY.

An endeavor has been made to collect certain data pertaining to the Brava problem in Marion, Massachusetts, to determine what major educational problems confront the Brava and what provisions should be made in the school program of Marion for these Portuguese boys and girls who constitute a greater per cent of the school enrollment each successive year (graph--2).

It is a problem which is very pertinent and urgent here in that the number of Brava pupils enrolled in the schools has been constantly increasing (graph--1). All facts and data ascertained are based upon the conditions in this community. It is pertinent also to a greater or less extent in other Cape Communities. Although large Cape Verdean centers are present principally in such towns as Marion, Wareham, Falmouth, Harwich and Provincetown, all the towns of the Cape have island Portuguese as members of their communities.

The town of Marion is located on Cape Cod approximately sixty miles from Boston, Massachusetts. It has a total population of 2030; of this number about 40 % are Bravas or Cape Verdeans.

The Cape Verdean Island group form an archipelago

300 miles off the west coast of Africa and constitute part of the Portuguese Colonial Empire. The name is derived from the African promontory off which they lie, known as Cape Verde or the green cape. (7, pp.791--792) (16, pp.1249--1250).

The first settlers on the islands imported negroes from the African coast, principally for the development of the slave trade with America and for the tilling of the near-marginal lands of the islands.

The slave population increased annually until 1854 when the government freed the public slaves and ameliorated their living conditions by the introduction of private ownership. In 1857 arrangements were made for the abolition and by 1876, the last slave was freed. (16, pp.1249--1250) (13,editorial).

Thus, we see that the island Portuguese, from which localities the United States receives the greatest number of Portuguese immigrants, have received more than a negligible infusion of negro blood. Immigrants to the United States from the Cape Verde Islands have been classified as "colored" by the Massachusetts and Federal Censuses since 1915. (17, pp.49--57).

There seems to be a difference of opinion in regard to the manner in which the Black Portuguese arrived in America,(New Bedford).

Since the first whale ship stopped at the harbor of Fayal, in the island of Brava, for water and took on board one of the natives, the tide of immigration from these islands has set this way. Later, whale ships which put out of New Bedford with skeleton crews brought back natives as part of the ship's company. (13, editorial).

In almost every case, New Bedford was the destination of the emigrating Cape Verdeans. New Bedford was the first city in the United States that these people knew anything about, and while, in later years, some of the packets made Providence their port of entry, New Bedford remained the city of the new world for the people of the Cape Verde Islands. (13, editorial).

Many of the immigrants have remained in New Bedford. Numbers migrated to outlying districts, the majority to the cranberry districts of Cape Cod and the towns of Barnstable County. (13, editorial).

The cranberry crop and the Portuguese may be considered as one. Owners, desirous of cheap labor to harvest their crops and care for their bogs, soon recognized the Portuguese as the means to an end. As one bog owner states, "Their (Cape Verdean) labor is cheap, not so much because of the wages they are paid, but rather because of the type of work they will do." (12, Long's thesis, p. 11).

Thus, we have in brief the history of the Brava. The problem of this group is becoming more acute and some

solution must be found. Therefore, it shall be the purpose of this thesis to analyse the situation as it exists in Marion, Massachusetts, and to suggest possible solutions and remedies.

CHAPTER II

SCHOOL STATISTICS

An endeavor has been made to collect such statistics as seemed pertinent to a solution of the Brava problem in Marion, Massachusetts.

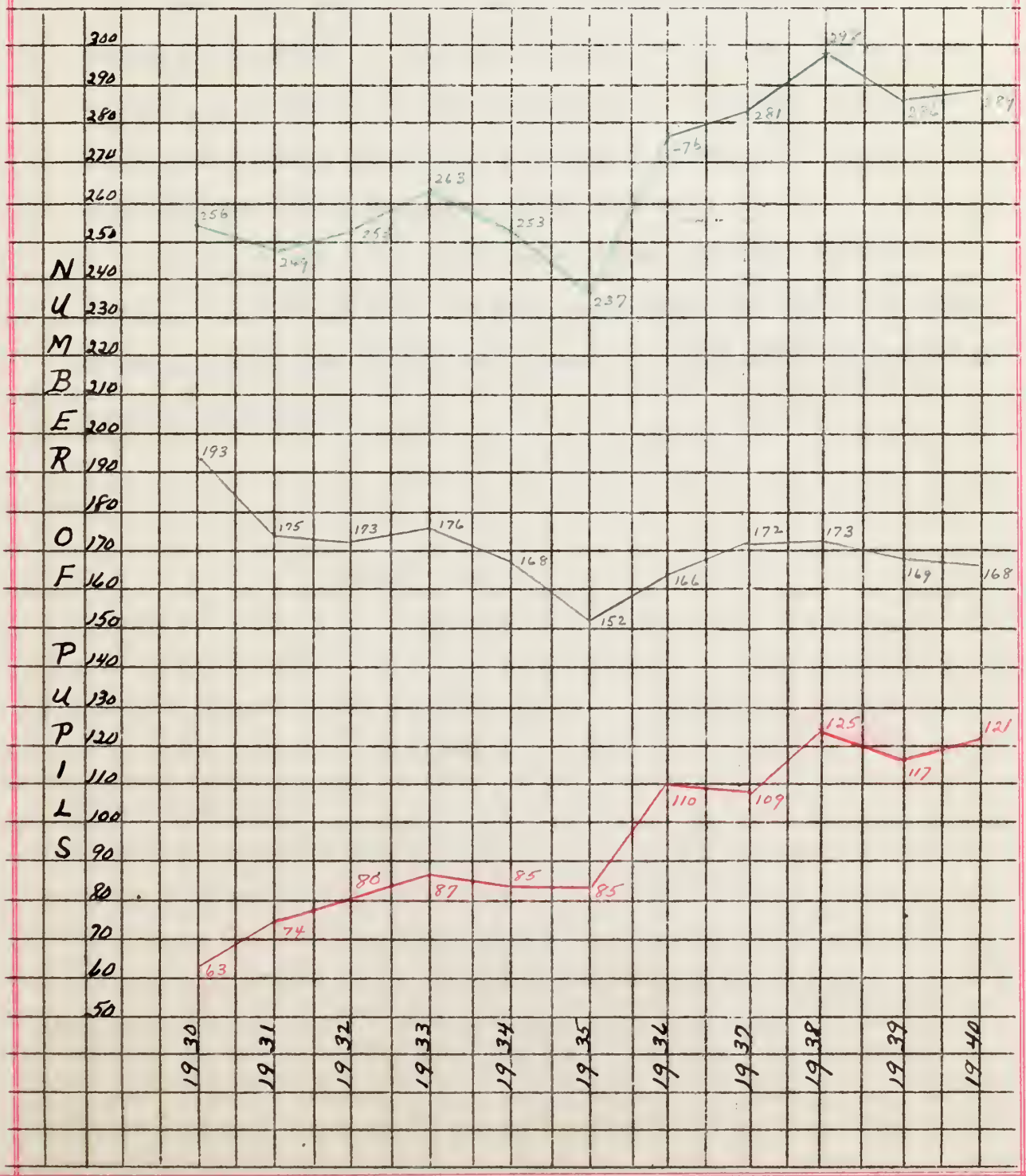
A brief description of how the work was carried on follows: school registers, permanent record cards and the reports of the Marion School Department as they appeared in the Marion Town Report (1930--1940) were consulted. The total enrollment of each group was tabulated as to number and per cent for a period of 11 years (1930--1940). The histories or progress of successive classes was traced to determine the increase or decrease in membership and the per cent of yearly retention in each grade each year. Graphs have been made to determine in what grades the greatest per cent of retention has taken place over a period of years.

Throughout the study the Brava pupils are listed and tabulated separately, since information was sought about them and since the White group is used as the control group.

GRAPH 1

THE WHITE, BRAVA AND TOTAL ENROLLMENT IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1930--1940.

(The data are collected as of the total enrollment for each year)



Graph 1 shows the total enrollment for the schools, the White and the Brava enrollment for each year for a period of eleven years (1930--1940).

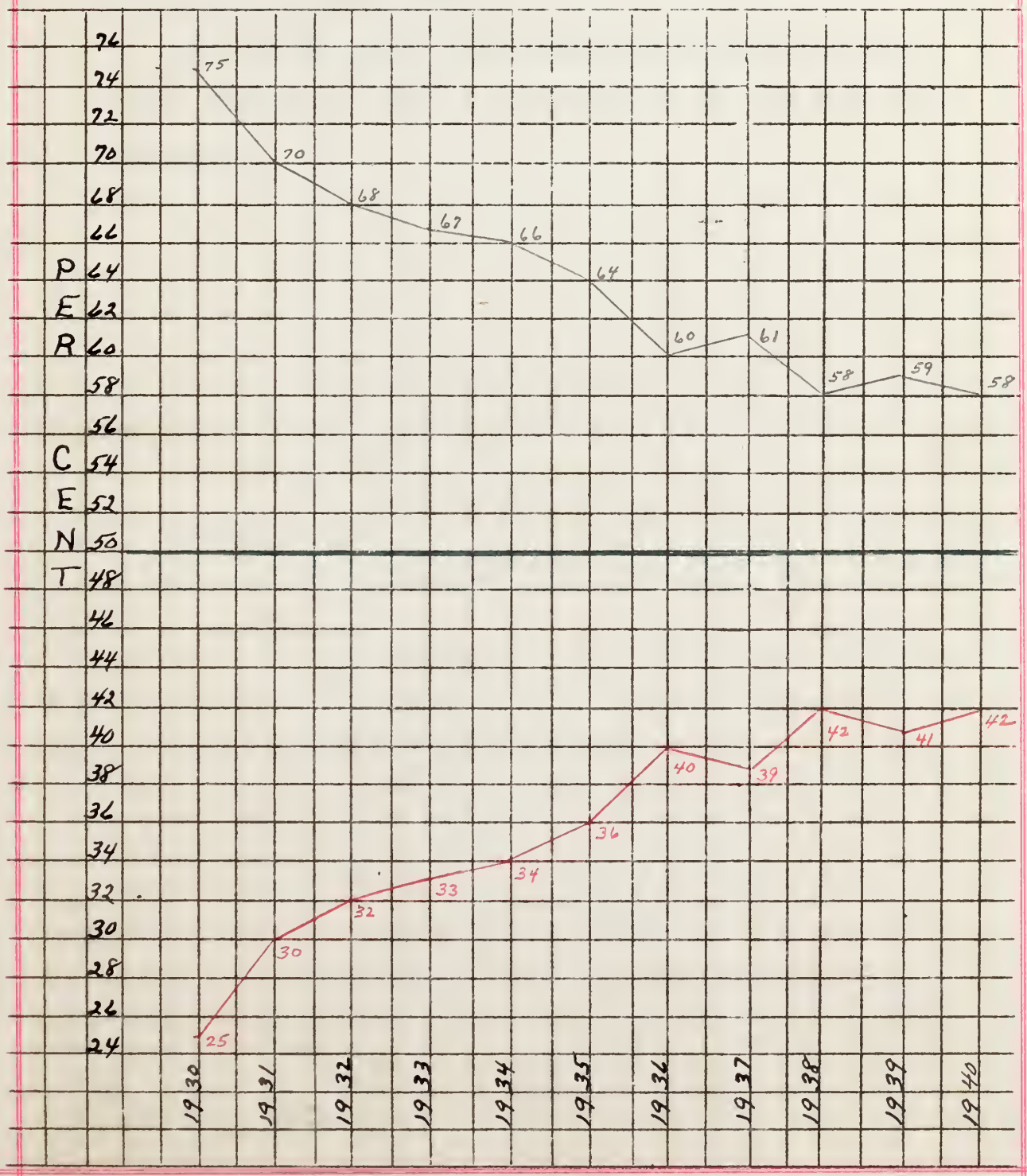
Over this period of years the Brava enrollment increased gradually, showing at the end of the eleven year period an increase in enrollment of 58 members; while the White enrollment decreased gradually showing at the end of the same period a decrease of 25 members.

In 1930 out of a total enrollment of 256, 63 were Bravas; in 1940 out of a total enrollment of 289, 121 were Bravas. Thus, the Brava enrollment is gradually approaching that of the White.

GRAPH 2

THE PER CENT OF WHITE AND BRAVA ENROLLMENT IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1930--1940.

(The percentages are based on the total enrollment for each year.)



Graph 2 shows the White and the Brava enrollment translated into percentages. Here it will be noted that the per cent of Bravas has almost doubled in the last ten school years (1930--1940).

In 1930 the Brava enrollment was only 25 % of the total, whereas in 1940 it had risen to 42 % of the total enrollment.

GRAPH 3

THE WHITE DISTRIBUTION EACH YEAR BY GRADE IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS.

1930----1940

GRADES	1930	1931	1932	1933	1934	1935	1936	1937	1938	1939	1940	Avg.
1	19	23	22	20	23	19	26	38	35	20	21	24.1
2	27	19	19	22	25	17	17	14	28	36	21	21.3
3	24	19	20	17	20	10	19	20	11	24	30	19.4
4	18	22	18	20	19	22	17	12	19	12	22	18.2
5	21	15	24	19	18	18	20	18	15	18	12	18.0
6	25	21	21	26	20	24	22	20	19	17	17	21.0
7	20	21	15	20	23	13	18	20	16	20	21	18.8
8	19	12	19	13	16	14	14	17	17	9	12	14.0
9	20	23	15	19	14	15	13	13	13	13	12	15.5
Total	193	175	173	176	168	152	166	172	173	169	168	175

Graph 3 shows the number of Whites enrolled for each year as they progress through the grades. Thus, in 1930 there were 19 White pupils in grade one. In grade two for 1931 there were also 19. This latter number is of course made up from the number that was in grade one the year before, after it had been influenced by the number transferred out of the system, the number transferred into the system and the number retarded.

GRAPH 4

THE BRAVA DISTRIBUTION EACH YEAR BY GRADE IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS.

1930----1940.

GRADES	1930	1931	1932	1933	1934	1935	1936	1937	1938	1939	1940	Avg.
1	18	26	17	19	18	11	26	19	22	27	15	19.8
2	13	10	16	10	11	15	10	21	20	11	23	14.5
3	9	14	9	13	13	13	17	22	22	20	10	14.7
4	5	5	14	11	10	11	17	12	13	20	21	12.8
5	8	4	6	13	13	8	10	8	9	12	17	9.8
6	4	8	6	6	9	13	10	9	14	8	11	8.9
7	4	2	8	7	7	9	9	9	13	11	10	8.0
8	2	4	2	6	3	3	5	6	5	8	6	4.5
9	0	1	2	2	1	2	6	3	7	0	8	2.9
Total	63	74	80	87	85	85	110	109	125	117	121	%

Graph 4 shows the number of Bravas enrolled each year as they progress through the grades. Thus, in 1930 there were 18 Brava pupils in grade one. In grade two for 1931 there were only 10. This latter number is of course made up from that number that was in grade one the year before, after it had been influenced by the number transferred out of the system, the number transferred into the system and the number retarded.

GRAPH 3 --- GRAPH 4

Each grade is represented by a rectangle for each year and the diagonal that passes through each rectangle traces the numerical history of each grade as it progresses year by year.

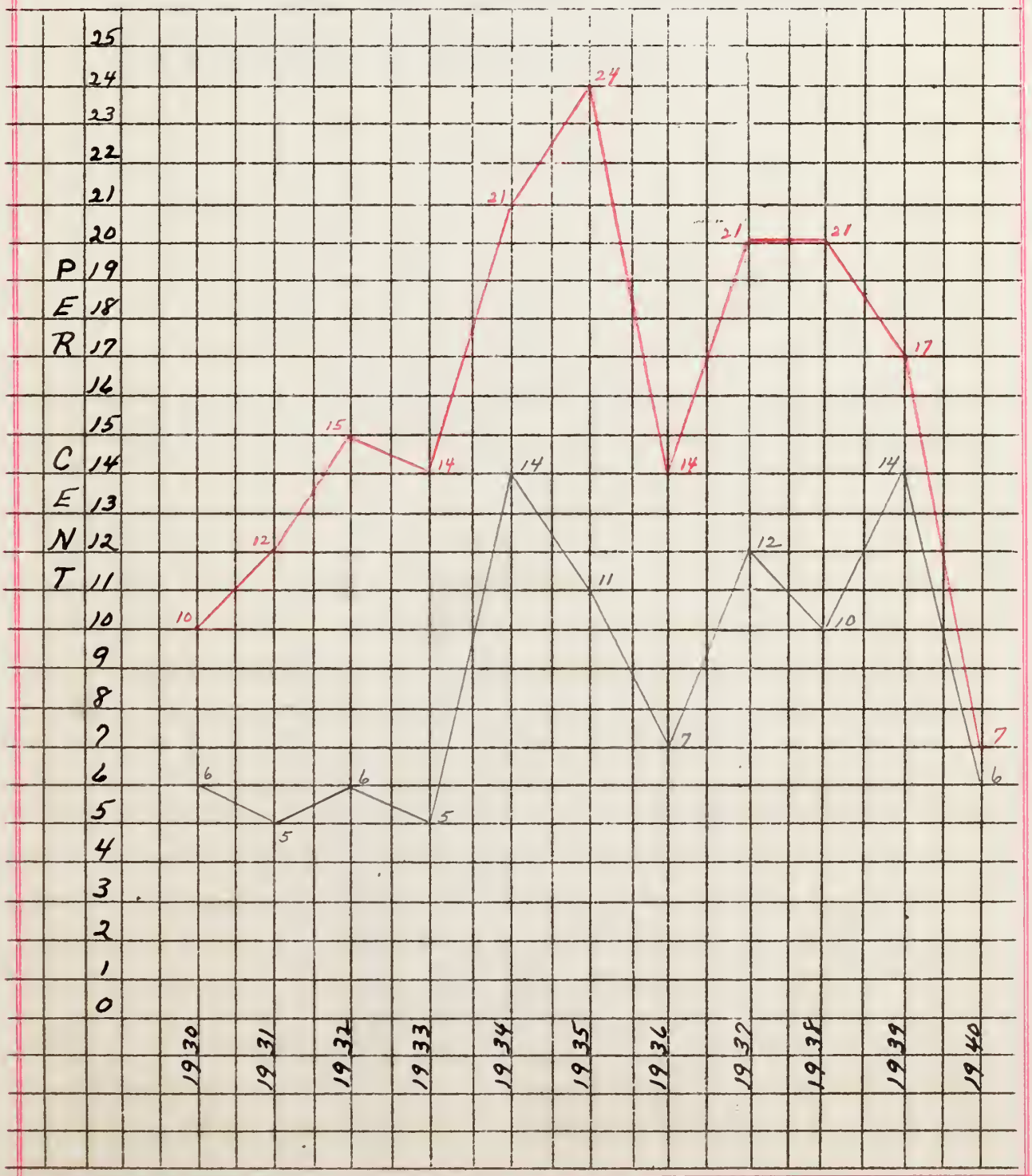
There were 18 Bravas enrolled in the first grade in 1930 against 19 Whites enrolled in that grade for the same year. In the second grade in 1931 there were only 10 Bravas, a decrease of 44.4 %. At the same time there were 19 Whites in grade two as compared to 19 in grade one the year before, indicating no change in membership. As we trace this same class as it progresses from year to year, we find that of the 18 Bravas enrolled in grade one only 7 were enrolled in grade nine, a decrease of 61.1 %. Of the 19 Whites enrolled in the same grade one, 13 were enrolled in grade nine, a decrease of only 31.5 %, approximately half the decrease of the Brava. As we examine the Brava enrollment of the class entering school in 1931, we find that of the 26 Bravas in grade one, none was enrolled in grade nine, a decrease of 100 %. Of the 23 Whites enrolled in the same grade one, 13 were enrolled in grade nine,a decrease of only 47.8 %. The average membership for the Brava members of grade one for eleven years (1930--1940) was 19.8; while the average membership for grade nine for the same eleven year period was 2.9, a difference of 16.9 or 85.3 %. The average White

membership of grade one for the same period was 24.1 ; while the average membership for grade nine was 15.5 , a difference of 8.6 or only 35.6 %. Again the decrease in the White enrollment is approximately half the Brava decrease.

An analysis of any class, as it progresses year by year will show a decrease in enrollment. The average White decrease in enrollment between grades one and nine for the eleven years (1930--1940) has been 8.6 or 35.6 %; as compared to the average Brava decrease of 16.9 or 85.3 %, a difference of 49.7 %. This indicates that approximately 50 % more Whites than Bravas attain the ninth grade.

GRAPH 5

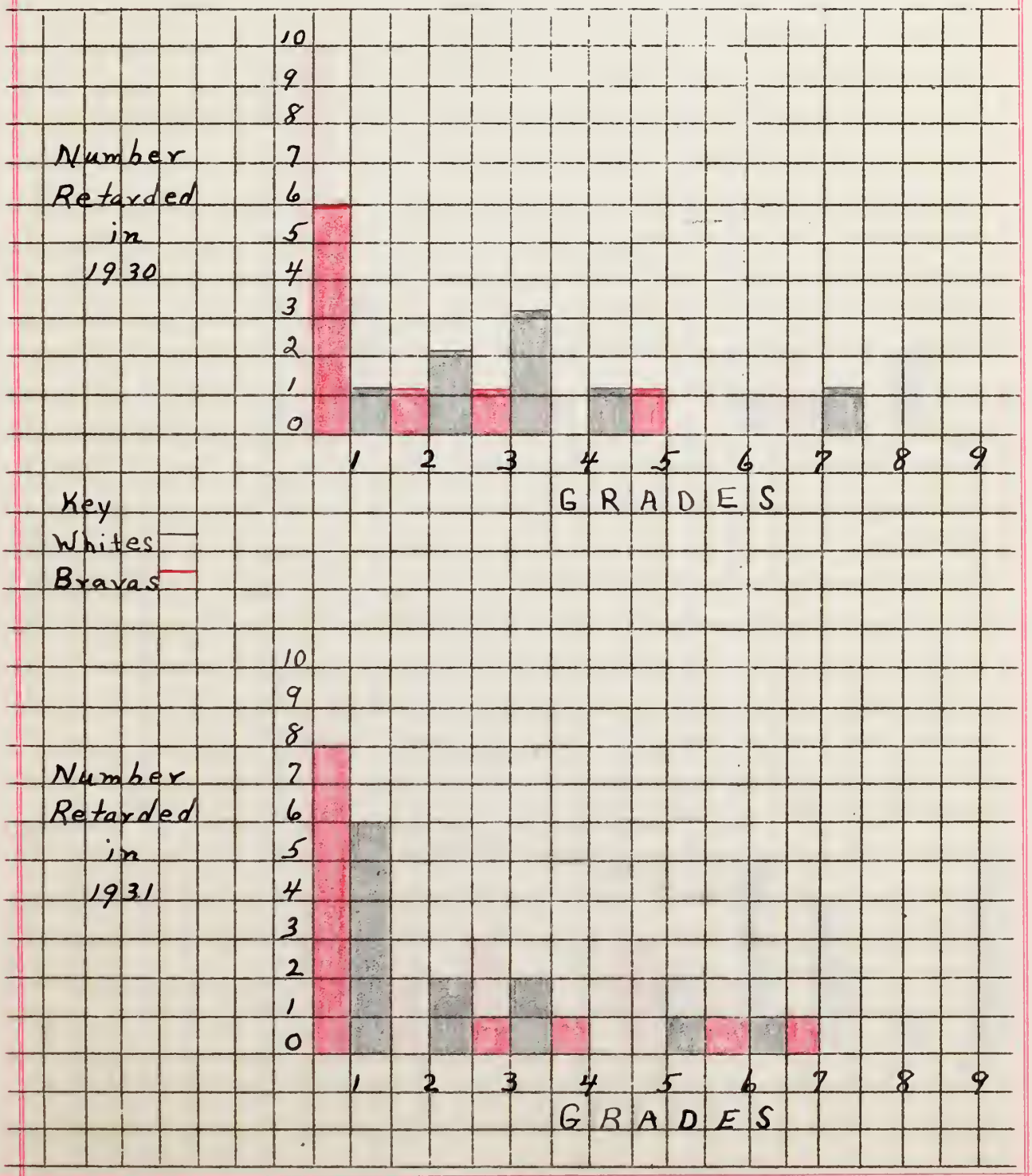
THE PER CENT OF WHITE AND BRAVA PUPILS REPEATING ALL GRADES IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1930--1940.



Graph 5 reveals that there are almost twice as many failures among the Bravas as among the Whites. The average per cent of failures for the Brava for a period of eleven years (1930--1940) was 16 % as compared to an average of 8.7 % for the Whites.

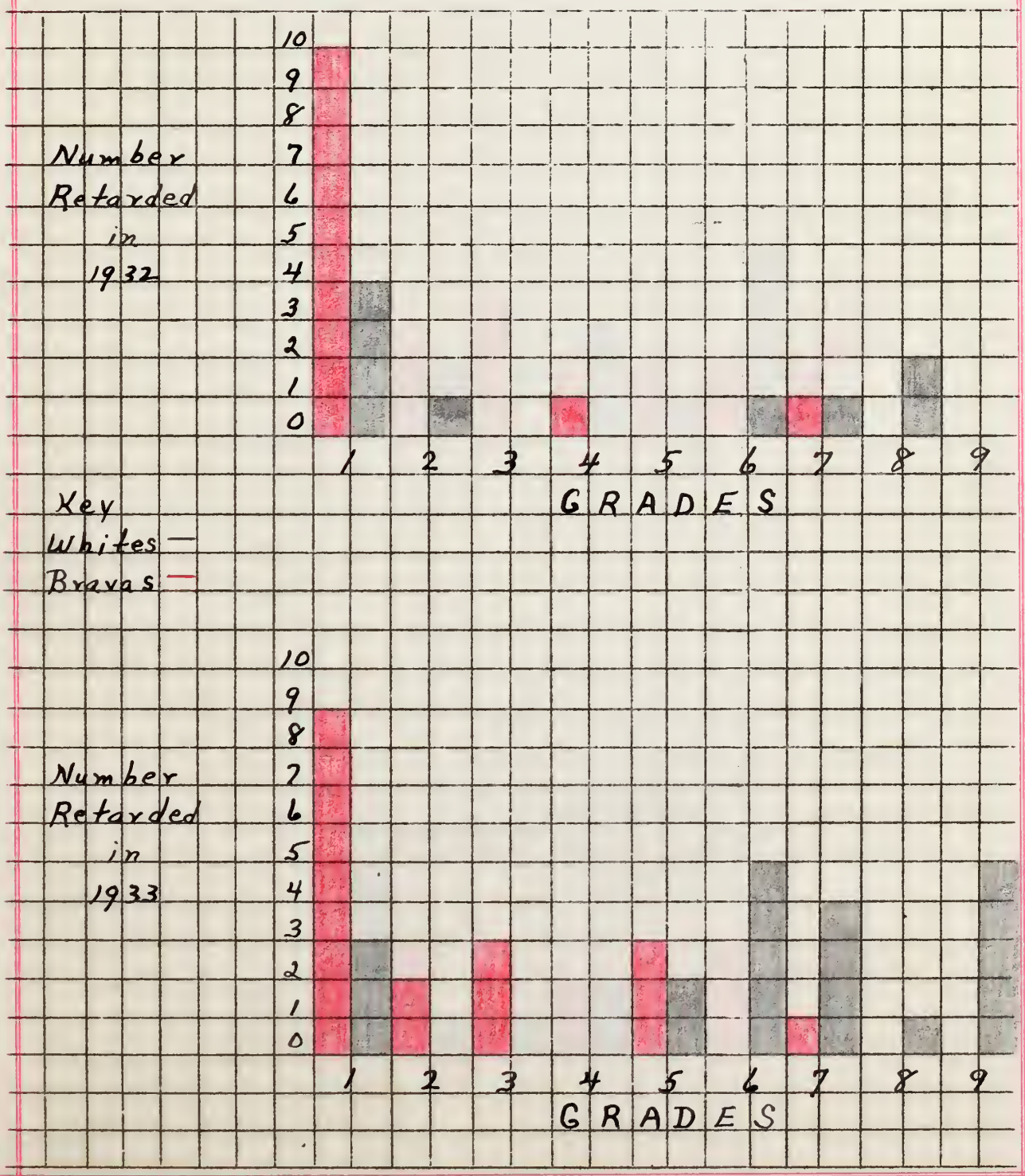
GRAPH 6----GRAPH 7

THE DISTRIBUTION OF RETARDATION (FAILURE TO BE PROMOTED) BY YEAR AND GRADE IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS. 1930---1940.



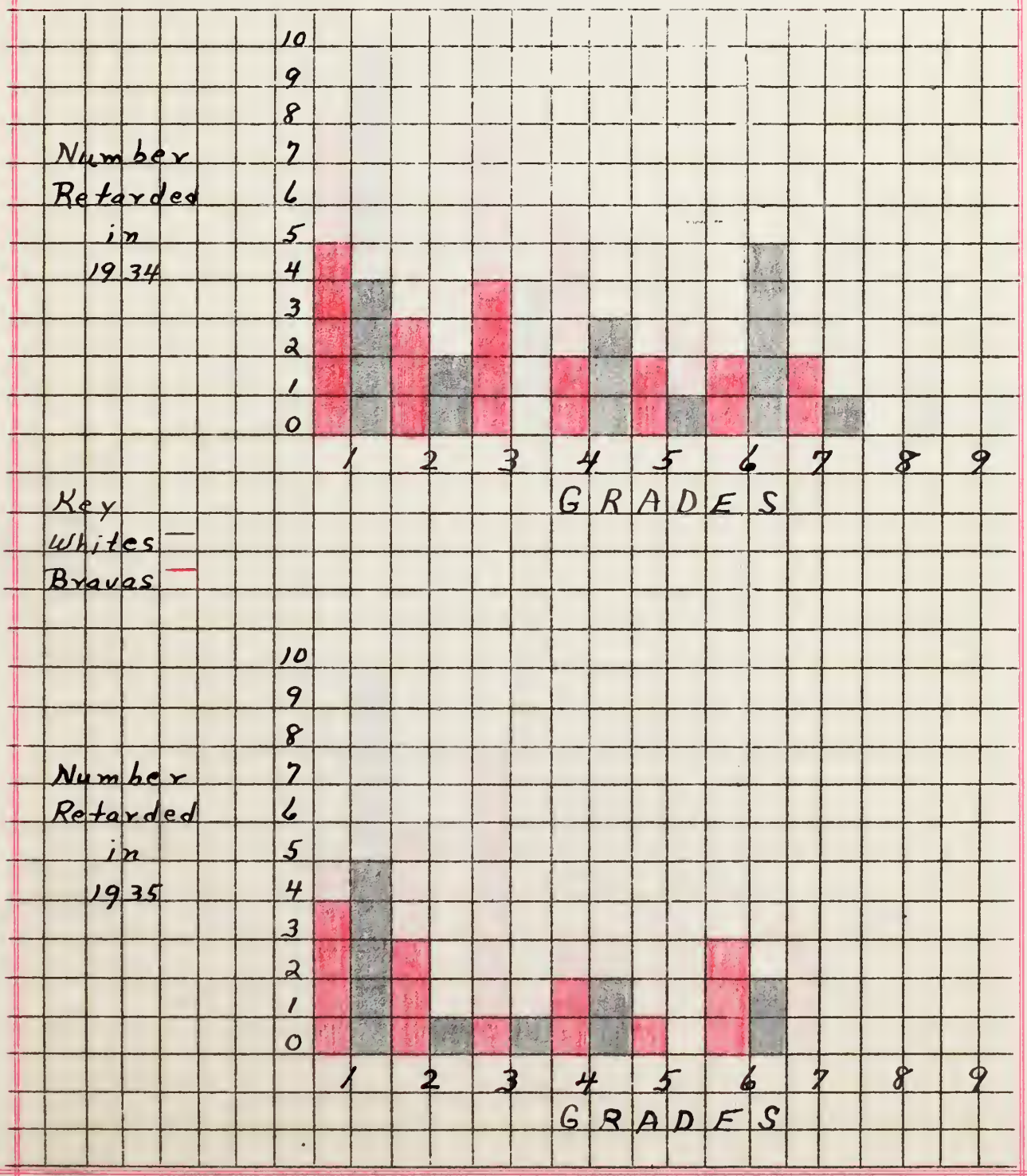
GRAPH 8----GRAPH 9

THE DISTRIBUTION OF RETARDATION (FAILURE TO BE PROMOTED) BY YEAR AND GRADE IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS. 1930----1940.



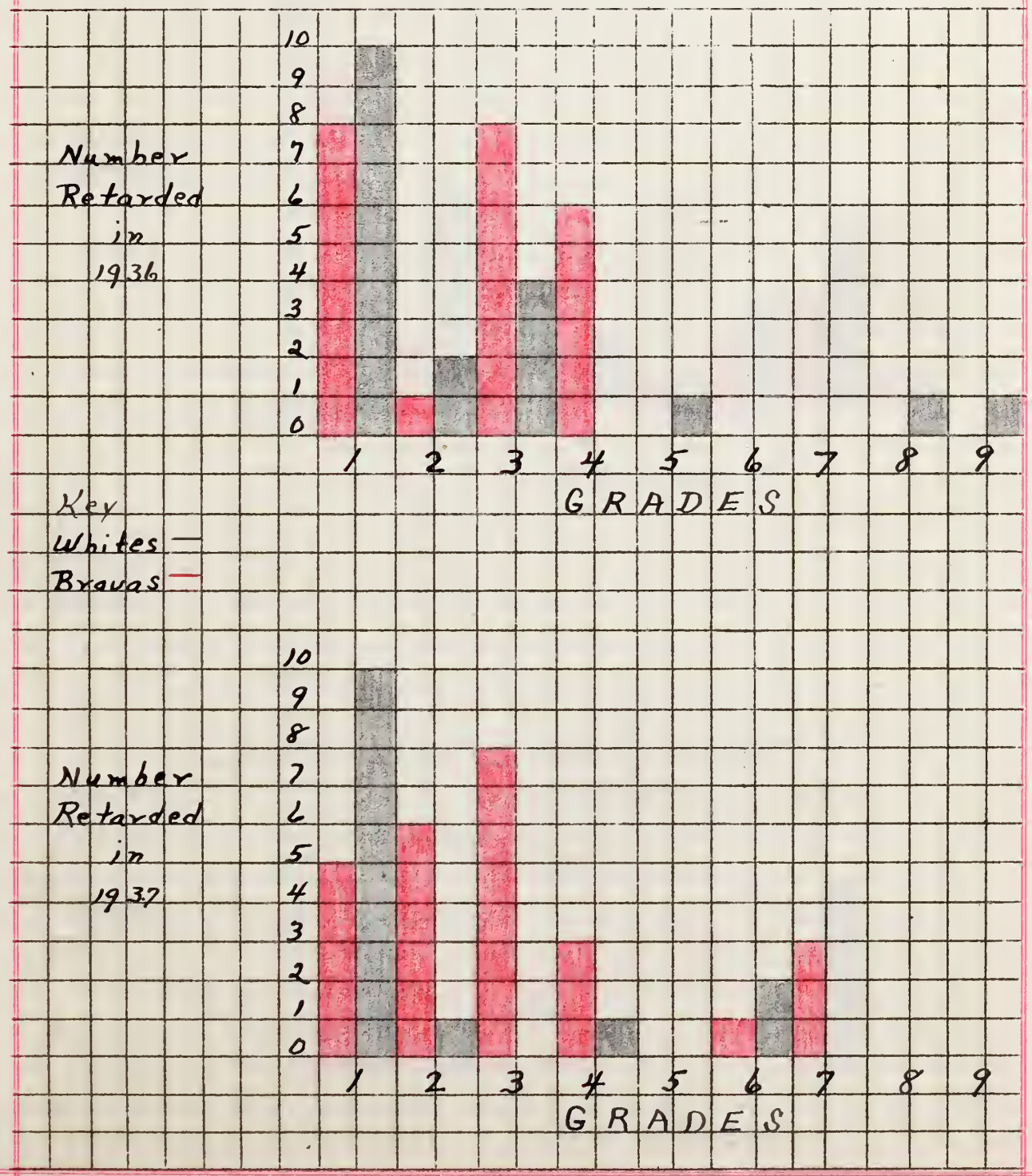
GRAPH 10----GRAPH 11

THE DISTRIBUTION OF RETARDATION (FAILURE TO BE PROMOTED) BY YEAR AND GRADE IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS. 1930----1940.



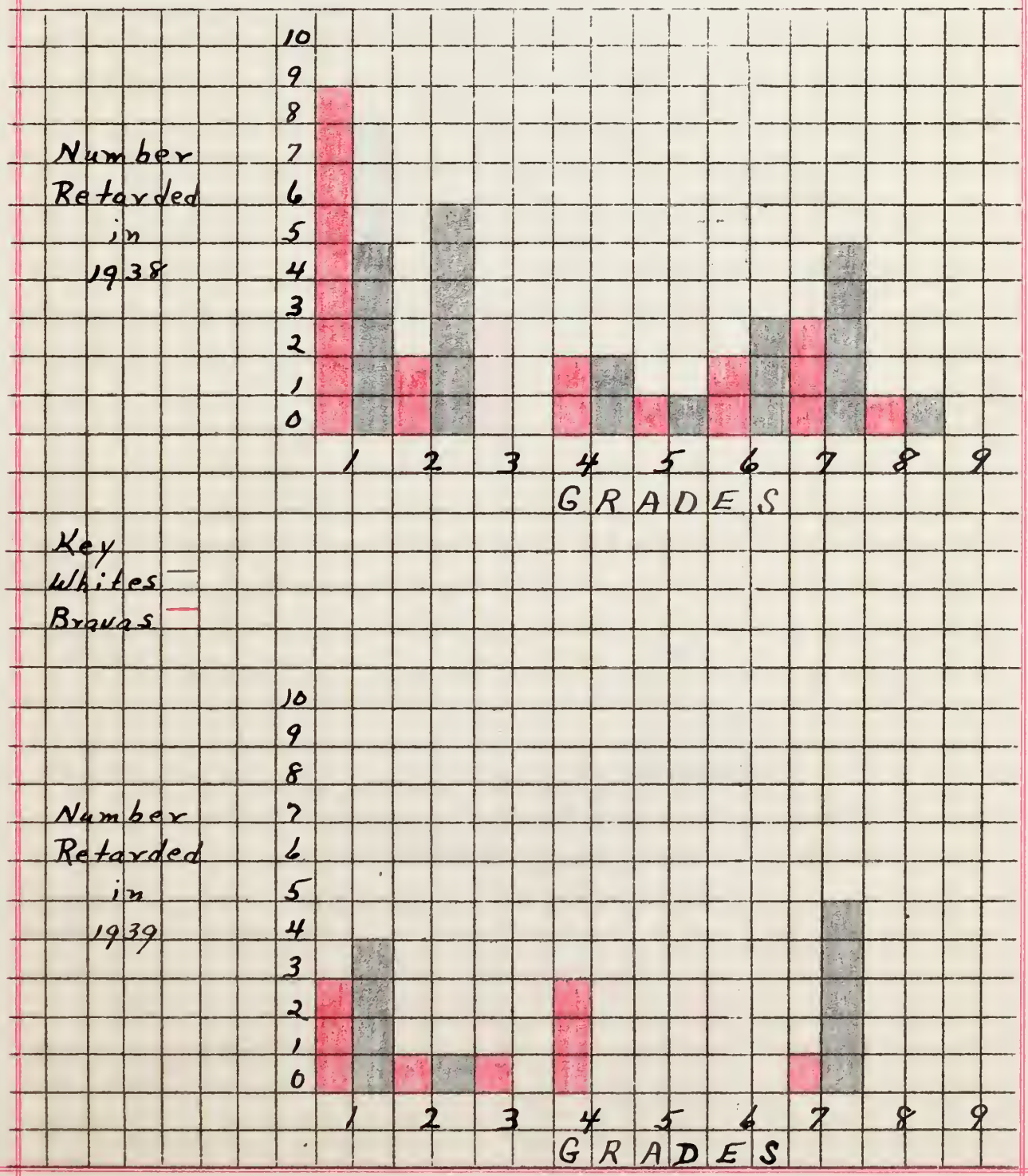
GRAPH 12----GRAPH 13

THE DISTRIBUTION OF RETARDATION (FAILURE TO BE PROMOTED) BY YEAR AND GRADE IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS. 1930----1940.



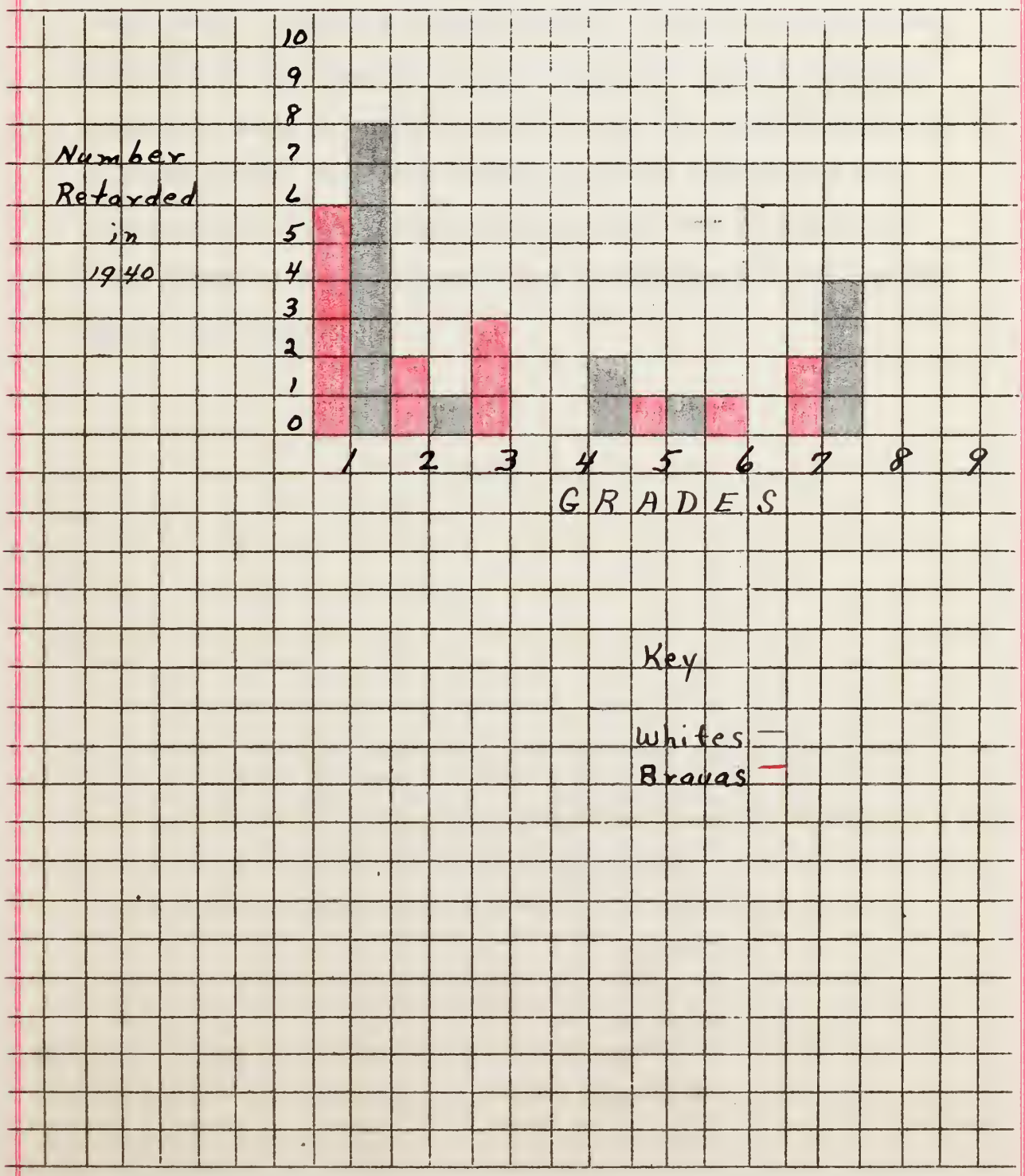
GRAPH 14----GRAPH 15

THE DISTRIBUTION OF RETARDATION (FAILURE TO BE PROMOTED) BY YEAR AND GRADE IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS. 1930----1940.



GRAPH 16

THE DISTRIBUTION OF RETARDATION (FAILURE TO BE PROMOTED) BY YEAR AND GRADE IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS. 1930----1940.



GRAPH 6 --- GRAPH 16

An examination of Graphs 6 through 16 shows the distribution of the White and the Brava pupils by grade each year. In making comparisons it should be remembered that these are numerical recordings and that references should be made to Graphs 3 and 4 for the number enrolled in each grade. The data shown in these graphs are not particularly significant because there is no stability from grade to grade between the percentages of White and Brava enrollment.

TABLE I

THE AVERAGE MEMBERSHIP AND RETENTION OF THE WHITE CHILDREN IN EACH GRADE IN THE PUBLIC SCHOOLS OF MARION (1930--1940)

GRADES	AVERAGE MEMBERSHIP	AVERAGE NUMBER RETAINED
1	24.1	6.0
2	21.3	1.9
3	19.4	1.0
4	18.2	1.1
5	18.0	.8
6	21.0	1.9
7	18.8	2.1
8	14.0	.5
9	15.5	.6

There is a gradual decrease in the average White retention from the first to the sixth grade (6.0--.8). The greatest White retention occurs in the sixth and seventh grades. The average White membership decrease is 8.6, only ½ as great as the Brava.

TABLE II

THE AVERAGE MEMBERSHIP AND RETENTION OF THE BRAVA CHILDREN IN EACH GRADE IN THE PUBLIC SCHOOLS OF MARION (1930--1940)

GRADES	AVERAGE MEMBERSHIP	AVERAGE NUMBER RETAINED
1	19.8	7.3
2	14.5	2.1
3	14.7	3.0
4	12.8	2.0
5	9.8	.9
6	8.9	1.1
7	8.0	1.4
8	4.5	.1
9	2.9	.0

Table II clearly indicates that the greatest Brava retention takes place in grades 1, 2, 3 and 4, while there is little or no Brava retention in grades 8 and 9. Generally speaking, there are more Bravas retained in each of the first five grades than there are Whites. The decrease in the number of Bravas retained from grade one to grade nine is due to the fact that there is a far greater number of Bravas in grade one; the average membership decreases from 19.8 to 2.9. The fact that only one Brava

was retained in grade eight and that none was retained in grade nine must be considered in relation to an average membership of 4.5 and 2.9 respectively. The average Brava membership decrease is 16.9, almost twice as great as the White,

CHAPTER III

INTELLIGENCE QUOTIENTS

The intelligence quotients from which the medians of the various grades have been established were obtained from an analysis of the official school records. The records referred to are the results of several years of testing. Each year the school department has made it a policy to have representatives from the Massachusetts State Department of Mental Health test those pupils enrolled who have not been previously tested plus those who in the opinion of the school authorities should be re-tested.

The Stanford Revision of the Binet Simon Tests is used and the intelligence quotients are computed by the state psychiatrist by individual testing.

TABLE III

THE FREQUENCY DISTRIBUTION OF I Q's AMONG THE WHITE AND BRAVA CHILDREN OF THE FIRST GRADES IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1930--1940.

WHITE I Q's.					BRAVA I Q's.				
Scores	f.	d.	fd.	fd.	Scores	f.	d.	fd.	fd.
120--129	1	2	2	4	120--129				
110--119	4	1	4	4	110--119				
100--109	3	0	0	0	100--109	2	2	4	8
90--99	4	-1	-4	4	90--99	1	1	1	1
80--89	4	2	8	16	80--89	6	0	0	0
70--79					70--79	4	-1	-4	4
60--69					60--69	2	2	4	8
50--59					50--59				
	16		-6	28		15		-3	21
Mean Score			101.25		Mean Score			83.13	
Median Score			95.00		Median Score			88.30	
Standard Deviation			12.60		Standard Deviation			11.50	

An examination of Table III results in the following conclusions concerning grades 1:

Fifty per cent (50) of the White cases lie above the median 95.0 and that 50 % of the Brava cases lie above the median 88.3, a difference of 6.7 scores.

The White I Q's are 6.7 scores greater than the Bravas; furthermore, 92.1 % of the Whites equal or exceed the average I Q of the Brava, while not a single member of the Brava group attains the White mean of 101.25.

TABLE IV

THE FREQUENCY DISTRIBUTION OF I Q's AMONG THE WHITE AND BRAVA CHILDREN OF THE SECOND GRADES IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1930--1940.

WHITE I Q's					BRAVA I Q's				
Scores	f.	d.	fd.	fd.	Scores	f.	d.	fd.	fd.
120--129	2	2	4	8	120--129				
110--119	7	1	7	7	110--119				
100--109	2	0	0	0	100--109				
90--99	2	-1	-2	2	90--99	4	2	8	16
80--89	3	2	6	12	80--89	9	1	9	9
70--79	3	3	9	27	70--79	7	0	0	0
60--69					60--69	2	-1	-2	2
50--59					50--59	1	2	2	4
	19		-6	56		23		13	31
Mean Score			101.85		Mean Score			80.60	
Median Score			105.00		Median Score			82.20	
Standard Deviation			16.80		Standard Deviation			10.10	

An examination of Table IV results in the following conclusions concerning grades 2:

Fifty per cent (50) of the White cases lie above the median 105.0 and that 50 % of the Brava cases lie above the median 82.2, a difference of 22.8 scores.

The White I Q's are 22.8 scores greater than the Bravas; furthermore, 83.2 % of the Whites equal or exceed the average I Q of the Brava, while not a single member of the Brava group attains the White mean of 101.85.

TABLE V

THE FREQUENCY DISTRIBUTION OF I Q's AMONG THE WHITE AND BRAVA CHILDREN OF THE THIRD GRADES IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1930--1940.

WHITE I Q's.					BRAVA I Q's.				
Scores	f.	d.	fd.	fd.	Scores	f.	d.	fd.	fd.
120--129	1	4	4	16	120--129				
110--119	0	3	3	9	110--119				
100--109	7	2	14	28	100--109				
90--99	4	1	4	4	90--99	1	2	2	4
80--89	15	0	0	0	80--89	4	1	4	4
70--79	1	-1	-1	1	70--79	3	0	0	0
60--69	2	2	4	8	60--69	2	-1	-2	2
50--59					50--59				
	30		20	66		10		4	10
Mean Score	91.45				Mean Score	79.00			
Median Score	88.12				Median Score	75.00			
Standard Deviation	14.20				Standard Deviation	9.10			

An examination of Table V results in the following conclusions concerning grades 3:

Fifty per cent (50) of the White cases lie above the median 88.1 and that 50 % of the Brava cases lie above the median 75.0, a difference of 13.1 scores.

The White I Q's are 13.1 scores greater than the Bravas; furthermore, 90.6 % of the Whites equal or exceed the average I Q of the Brava, while only 10 % of the Brava group attain the White mean of 91.45.

TABLE VI

THE FREQUENCY DISTRIBUTION OF I Q's AMONG THE WHITE AND BRAVA CHILDREN OF THE FOURTH GRADE IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1930--1940.

WHITE I Q's.					BRAVA I Q's.				
Scores	f.	d.	fd.	fd.	Scores	f.	d.	fd.	fd.
120--129					120--129				
110--119	5	2	10	20	110--119				
100--109	6	1	6	6	100--109				
90--99	4	0	0	0	90--99	1	2	2	4
80--89	2	-1	-2	2	80--89	6	1	6	6
70--79	5	2	10	20	70--79	6	0	0	0
60--69					60--69	5	-1	-5	5
50--59					50--59	2	2	4	8
	22		4	48		20		-1	23
Mean Score 96.81					Mean Score 74.50				
Median Score 95.00					Median Score 75.00				
Standard Deviation 14.60					Standard Deviation 15.00				

An examination of Table VI results in the following conclusions concerning grades 4:

Fifty per cent (50) of the White cases lie above the median 95.0 and that 50 % of the Brava cases lie above the median 75.0 , a difference of 20.0 scores.

The White I Q's are 20.0 scores greater than the Bravas, furthermore, 89.4 % of the Whites equal or exceed the average I Q of the Brava, while only 5 % of the Brava group attain the White mean of 96.81.

TABLE VII

THE FREQUENCY DISTRIBUTION OF I Q's AMONG THE WHITE AND BRAVA CHILDREN OF THE FIFTH GRADES IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1930--1940.

WHITE I Q's.					BRAVA I Q's.				
Scores	f.	d.	fd.	fd.	Scores	f.	d.	fd.	fd.
120--129					120--129				
110--119	2	3	6	18	110--119				
100--109	0	2	0	0	100--109	1	3	3	9
90--99	3	1	3	9	90--99	2	2	4	8
80--89	4	0	0	0	80--89	2	1	2	2
70--79	1	-1	-1	1	70--79	6	0	0	0
60--69	2	2	4	8	60--69	4	-1	-4	4
50--59					50--59	2	2	4	8
	12		4	30		17		1	31

Mean Score 85.33 — Mean Score 78.30

Median Score 87.50 — Median Score 75.50

Standard Deviation 14.70 — Standard Deviation 13.40

An examination of Table VII results in the following conclusions concerning grades 5:

Fifty per cent (50) of the White cases lie above the median 87.5 and that 50 % of the Brava cases lie above the median 75.5, a difference of 12 scores.

The White I Q's are 12.0 scores greater than the Bravas; furthermore, 82.5 % of the Whites equal or exceed the average I Q of the Brava, while only 29.4 % of the Brava group attain the White mean of 85.33.

TABLE VIII

THE FREQUENCY DISTRIBUTION OF I Q's AMONG THE WHITE AND BRAVA CHILDREN OF THE SIXTH GRADES IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1930--1940.

WHITE I Q's.					BRAVA I Q's.				
Scores	f.	d.	fd.	fd.	Scores	f.	d.	fd.	fd.
120--129	2	2	4	8	120--129				
110--119	3	1	3	3	110--119				
100--109	4	0	0	0	100--109				
90--99	2	-1	-2	2	90--99				
80--89	4	2	8	16	80--89	4	1	4	4
70--79	2	3	6	18	70--79	1	0	0	0
60--69					60--69	3	-1	-3	3
50--59					50--59	2	2	4	8
	17		-9	47		11		-3	15
Mean Score 99.71					Mean Score 72.30				
Median Score 102.50					Median Score 75.00				
Standard Deviation 15.70					Standard Deviation 11.30				

An examination of Table VIII results in the following conclusions concerning grades 6:

Fifty per cent (50) of the White cases lie above the median 102.5 and that 50 % of the Brava cases lie above the median 75.0, a difference of 27.5 scores.

The White I Q's are 27.5 scores greater than the Bravas, furthermore, 97.2 % of the Whites equal or exceed the average I Q of the Brava, while not a single member of the Brava group attains the White mean of 99.7.

TABLE IX

THE FREQUENCY DISTRIBUTION OF I Q's AMONG THE WHITE AND BRAVA CHILDREN OF THE SEVENTH GRADE IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1930--1940.

WHITE I Q's.					BRAVA I Q's.				
Scores	f.	d.	fd.	fd.	Scores	f.	d.	fd.	fd.
120--129					120--129				
110--119	1	2	2	4	110--119				
100--109	7	1	7	7	100--109				
90--99	6	0	0	0	90--99				
80--89	3	-1	-3	3	80--89	2	2	4	8
70--79	4	2	8	16	70--79	3	1	3	3
60--69					60--69	3	0	0	0
50--59					50--59	2	-1	-2	2
	21		-2	30		10		5	13

Mean Score 94.05 — Mean Score 70.00

Median Score 97.00 — Median Score 65.00

Standard Deviation 11.80 — Standard Deviation 10.20

An examination of Table IX results in the following conclusions concerning grade 9:

Fifty per cent (50) of the White cases lie above the median 97.0 and that 50 % of the Brava cases lie above the median 65.0, a difference of 32.0 scores.

The White I Q's are 32.0 scores greater than the Bravas; furthermore, 98.1 % of the Whites equal or exceed the average I Q of the Brava, while not a single member of the Brava group attains the White mean of 94.05.

TABLE X

THE FREQUENCY DISTRIBUTION OF I Q's AMONG THE WHITE AND BRAVA CHILDREN OF THE EIGHTH GRADE IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1930--1940.

WHITE I Q's.					BRAVA I Q's.				
Scores	f.	d.	fd.	fd.	Scores	f.	d.	fd.	fd.
120--129					120--129				
110--119	3	2	6	12	110--119				
100--109	3	1	3	3	100--109	1	2	2	4
90--99	1	0	0	0	90--99	1	1	1	1
80--89	3	-1	-3	3	80--89	0	0	0	0
70--79	2	2	4	8	70--79	2	-1	-2	2
60--69					60--69	2	2	4	8
50--59					50--59				
	12		2	26		6		-3	15
Mean Score 96.60					Mean Score 80.00				
Median Score 95.00					Median Score 75.00				
Standard Deviation 14.60					Standard Deviation 15.00				

An examination of Table X results in the following conclusions concerning grade 8:

Fifty per cent (50) of the White cases lie above the median 95.0 and that 50 % of the Brava cases lie above the median 75.0, a difference of 20.0 scores.

The White I Q's are 20.0 scores greater than the Bravas; furthermore, 80.8 % of the Whites equal or exceed the average I Q of the Brava, while 33.3 % of the Brava group attain or exceed the White mean of 96.60.

TABLE XI

THE FREQUENCY DISTRIBUTION OF I Q's AMONG THE WHITE AND BRAVA CHILDREN OF THE NINTH GRADE IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1930--1940.

WHITE I Q's.					BRAVA I Q's.				
Scores	f.	d.	fd.	fd.	Scores	f.	d.	fd.	fd.
120--129					120--129				
110--119	1	2	2	4	110--119				
100--109	3	1	3	3	100--109				
90--99	3	0	0	0	90--99	1	2	2	4
80--89	2	-1	-2	2	80--89	2	1	2	2
70--79	2	2	4	8	70--79	2	0	0	0
60--69	1	3	3	9	60--69	3	-1	-3	3
50--59					50--59				
	12		-4	26		8		1	9
Mean Score 91.70					Mean Score 76.25				
Median Score 93.30					Median Score 75.00				
Standard Deviation 14.30					Standard Deviation 14.00				

An examination of Table XI results in the following conclusions concerning grade 9:

Fifty per cent (50) of the White cases lie above the median 93.3 and that 50 % of the Brava cases lie above the median 75.0, a difference of 18.3 scores.

The White I Q's are 18.3 scores greater than the Bravas; furthermore, 90.0 % of the Whites equal or exceed the average I Q of the Brava, while only 12.5 % of the Brava group attain or exceed the White mean of 91.70.

TABLE XII

THE FREQUENCY DISTRIBUTION OF I Q's AMONG THE WHITE AND BRAVA CHILDREN OF THE TOTAL ENROLLMENT IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1930--1940.

WHITE I Q's.					BRAVA I Q's.				
Scores	f.	d.	fd.	fd.	Scores	f.	d.	fd.	fd.
120--129	6	3	18	54	120--129				
110--119	26	2	52	104	110--119				
100--109	35	1	35	35	100--109	4	3	12	36
90--99	29	0	0	0	90--99	11	2	22	44
80--89	40	-1	-40	40	80--89	35	1	35	35
70--79	20	2	40	80	70--79	34	0	0	0
60--69	5	3	18	54	60--69	26	2	52	104
50--59					50--59	9	3	27	81
	161		7	367		119		-10	300
Mean Score 95.4					Mean Score 74.18				
Median Score 95.5					Median Score 77.3				
Standard Deviation 15.00					Standard Deviation 15.80				

An examination of Table XII results in the following conclusions concerning the total enrollment:

Fifty per cent (50) of the White cases lie above the median 95.5 and that 50% of the Brava cases lie above the median 77.3, a difference of 18.2 scores.

The White I Q's are 18.2 scores greater than the Bravas; furthermore, 96.0 % of the Whites equal or exceed the average I Q of the Brava, while but 12.6 % of the entire Brava group attain or exceed the average White mean of 95.40.

TABLE XIII

SUMMARY OF TABLES III --- XII CONCERNING THE WHITE INTELLIGENCE QUOTIENTS

Grades	Number Enrolled	Mean	Median	Standard Deviation	Per Cent Equal or Exceed Brava Mean
1	16	101.25	95.00	12.60	92.1%
2	19	101.85	105.00	16.80	83.2%
3	30	91.45	88.12	14.20	90.6%
4	22	96.81	95.00	14.60	89.4%
5	12	85.33	87.50	14.70	82.5%
6	17	99.71	102.50	15.70	97.2%
7	21	94.05	97.00	11.80	98.1%
8	12	96.60	95.00	14.60	80.8%
9	12	91.70	93.30	14.30	90.0%
Summary	161	95.40	95.50	15.00	96.0%

(Note - A detailed explanation of each group of figures may be had by consulting Tables III to XII.)

TABLE XIV

SUMMARY OF TABLES III --- XII CONCERNING THE BRAVA INTELLIGENCE QUOTIENTS.

Grades	Number Enrolled	Mean	Median	Standard Deviation	Per Cent Equal or Exceed White Mean
1	15	88.13	88.30	11.50	0.00%
2	23	80.60	82.20	10.10	0.00
3	10	79.00	75.00	9.10	10.00
4	20	74.50	75.00	15.00	5.00
5	17	78.30	75.50	13.40	29.40
6	11	72.30	75.00	11.30	0.00
7	10	70.00	65.00	10.20	0.00
8	6	80.00	75.00	15.00	33.33
9	8	76.25	75.00	14.00	12.50
Summary	119	74.18	77.30	15.80	12.60

(Note - A detailed explanation of each group of figures may be had by consulting Tables III to XII.)

CHAPTER IV

STANFORD ACHIEVEMENT TESTS

(Primary - Intermediate - Advanced - Batteries)

In order to have authoritative statistics as a means of comparing the Brava and White children for this study, the Stanford Achievement Test was administered in May, 1941. The results made it possible to compare the abilities and skills of the two groups with the national standards of attainment.

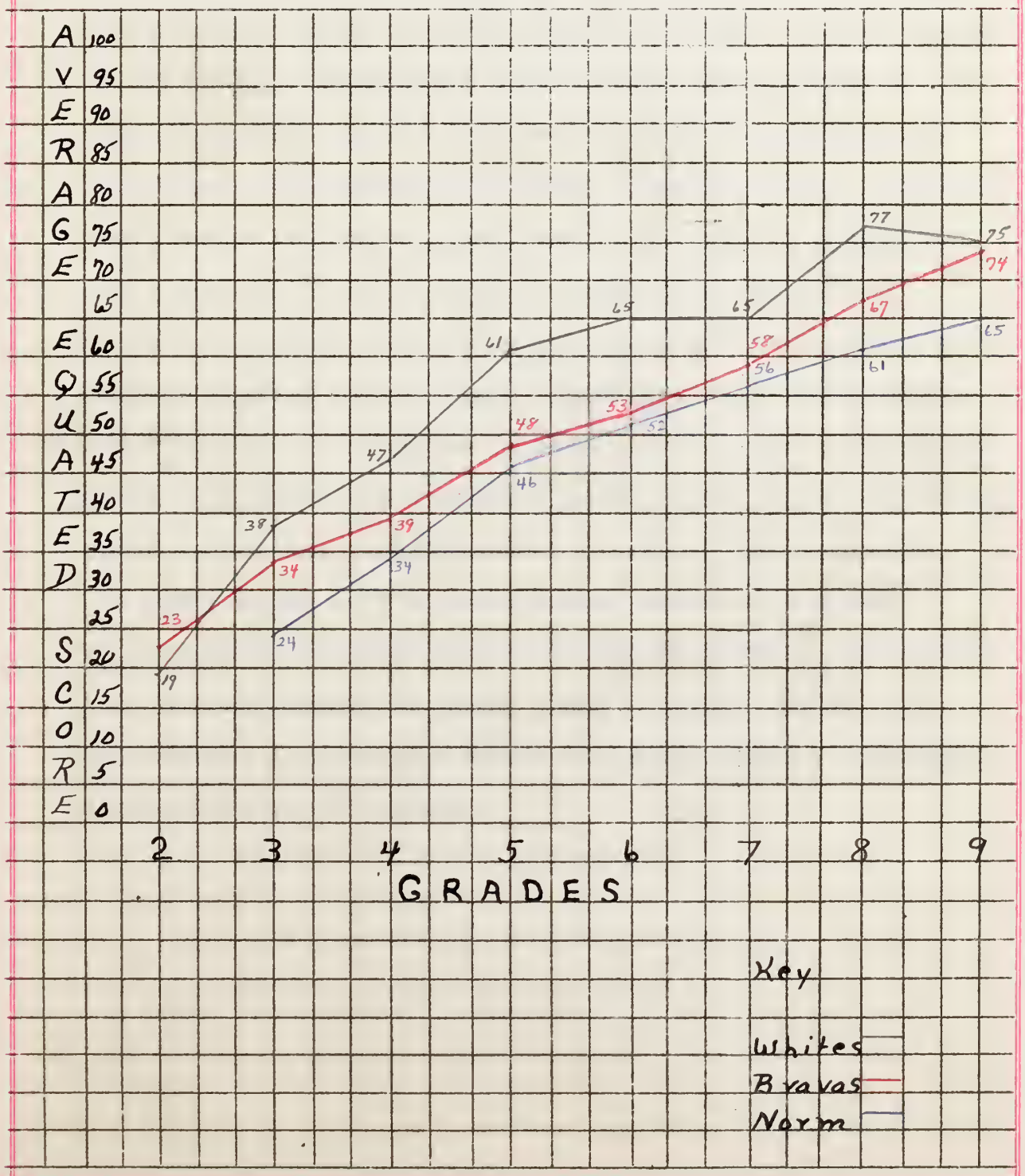
The testing program was under the personal supervision of Mr. John Glenn, Superintendent of Schools, Marion, Massachusetts. The tests were given in grades 2--9 inclusive and in as normal situations as humanly possible.

The tests were corrected by a group of four junior high teachers supervised by Mr. Glenn. The junior high school teachers corrected those tests which applied to their particular subjects in grades 6--9, inclusive, while the tests of grades 2--5 were corrected by Mr. Glenn and the reading supervisor.

(Note---Throughout the discussion of the test, equated scores will be used instead of raw scores. The most important characteristics of an equated score is that it has the same significance, no matter in what battery or test it may appear. Thus, the equated scores act as a kind of universal language for making comparisons.)

GRAPH 17

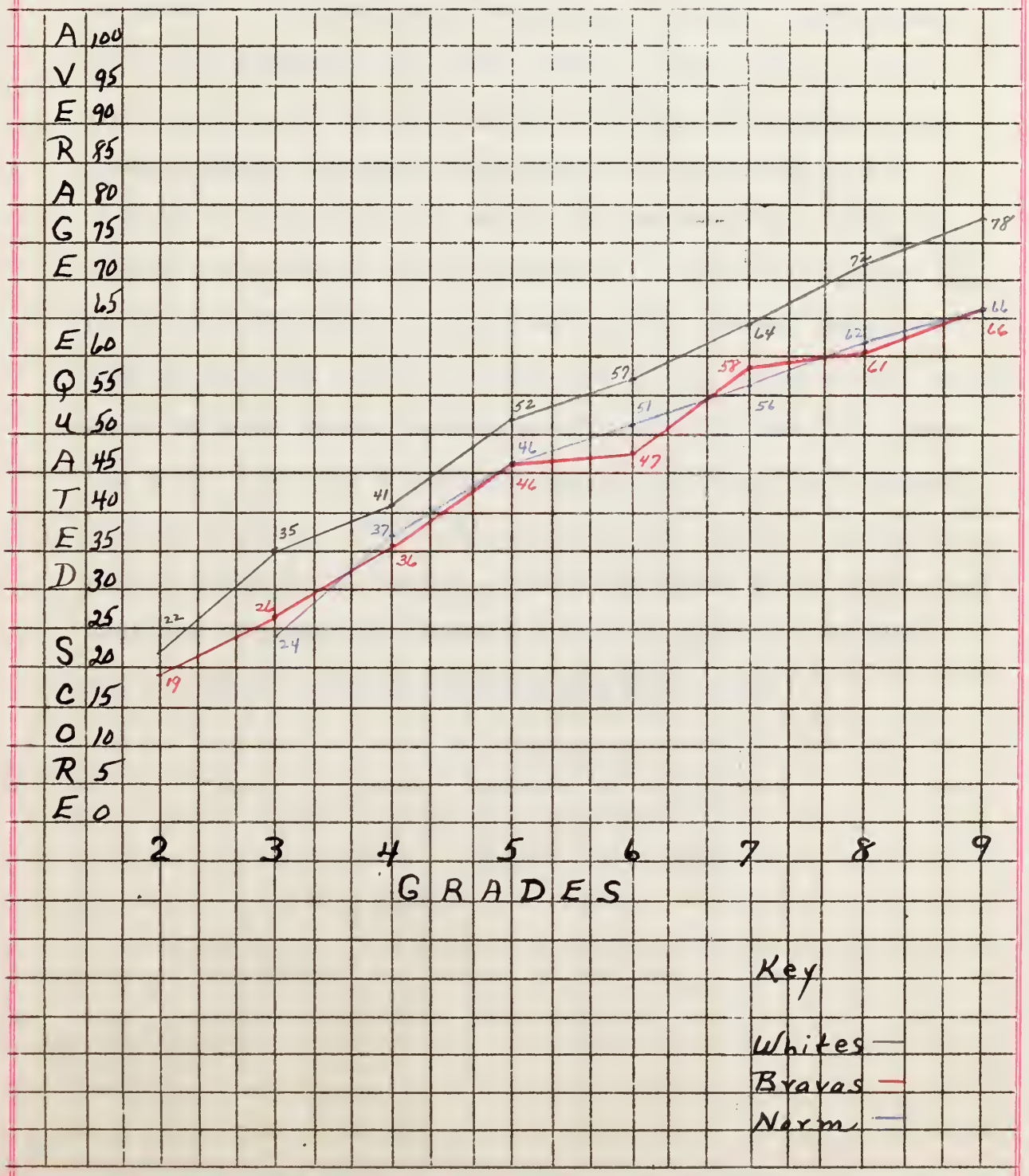
THE WHITE AND BRAVA RESULTS OF THE STANFORD ACHIEVEMENT TEST IN ARITHMETIC COMPUTATION IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS MAY, 1940.



Graph 17 indicates that in grade 2 the Brava group surpassed the White children by 4 equated scores, but in grade 9 the White group ranked 1 equated score above the Brava group indicating that the White group showed during their school career an improvement of 5 more equated scores in Arithmetic Computation than did the Brava group. At no time did either group go below the average equated score (the norm). The Brava group shows constant gradual improvement, while the White group reach a plateau in grades 6 and 7 and do not do so well in grade 9 as they did in grade 8. In grade 3 the Brava group is 10 scores above the average equated score, while the White is 14 scores above, a difference of 4 equated scores; but in grade 9 the Brava group is 9 above the average equated score, while the White group is 10 above, a difference of only 1 equated score. The Brava group is 3 equated scores nearer the White equated score in grade 9 than it was in grade 3. The Whites show no improvement in grade 7 and in grade 9 show less improvement (-2 scores), while the Brava shows a continual improvement in all grades.

GRAPH 18

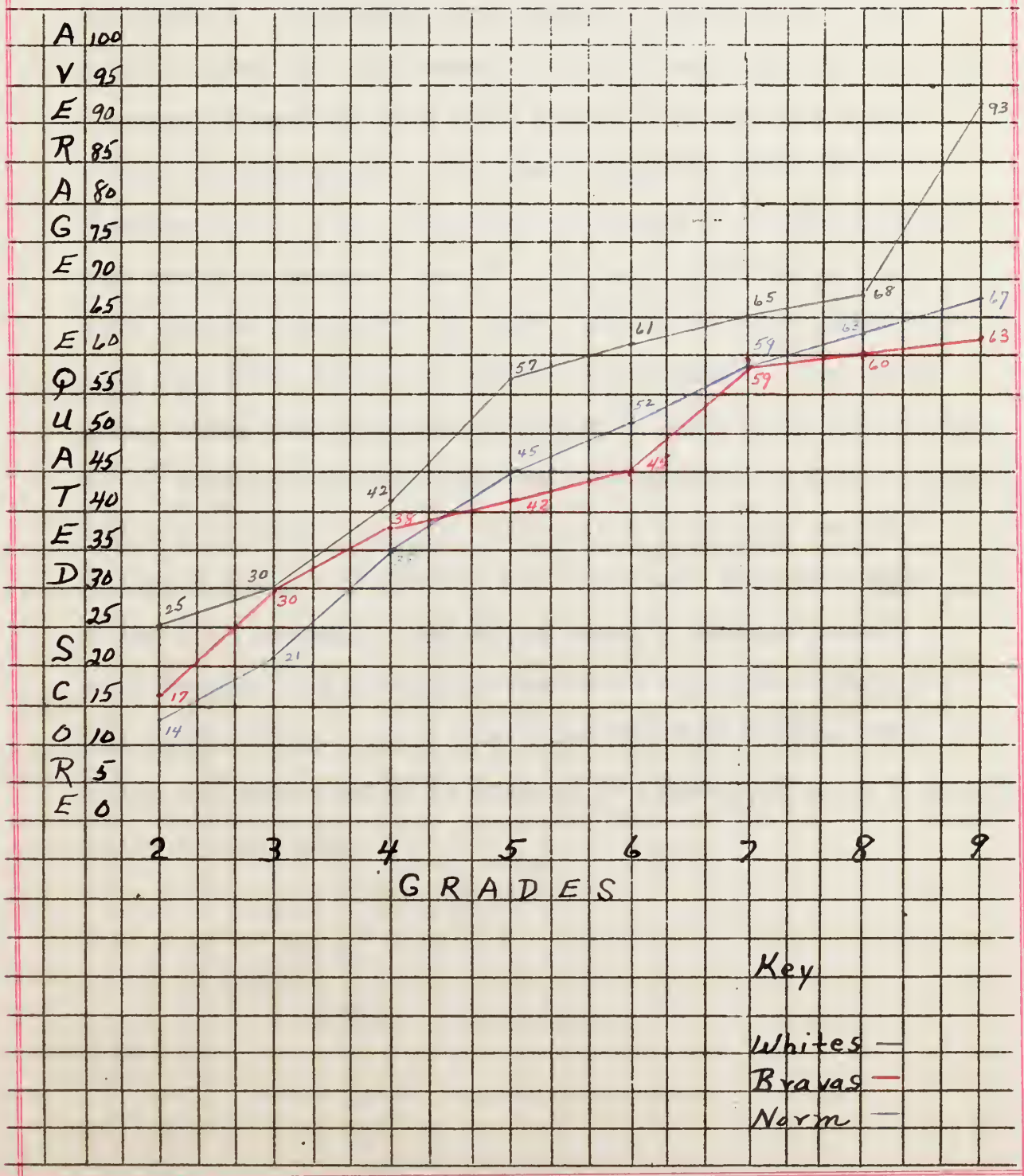
THE WHITE AND BRAVA RESULTS OF THE STANFORD ACHIEVEMENT TEST IN ARITHMETIC REASONING IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS MAY, 1940.



Graph 18 indicates that in grade 2 ~~that~~ there is between the White and the Brava groups a difference of only 3 equated scores as compared to a difference of 12 scores in grade 9. In Arithmetic Reasoning the White achievement is 4 times greater than the average achievement of the Brava group during their school careers. The White group shows gradual constant improvement of an average of 8 equated scores annually, while the Brava group shows an annual improvement of an average of 6 equated scores. At no time is the White group fewer than 4 scores above the average equated score, as compared to the Brava group, which is never more than 2 scores above and in grade 3 is below the norm. The White group shows the greatest achievement between grades 4 and 5 (11 scores) and the least between grades 5 and 6 (5 scores), while the Brava shows the greatest achievement between grades 6 and 7 (11 scores) and the least between grades 5 and 6 (1 score).

GRAPH 19

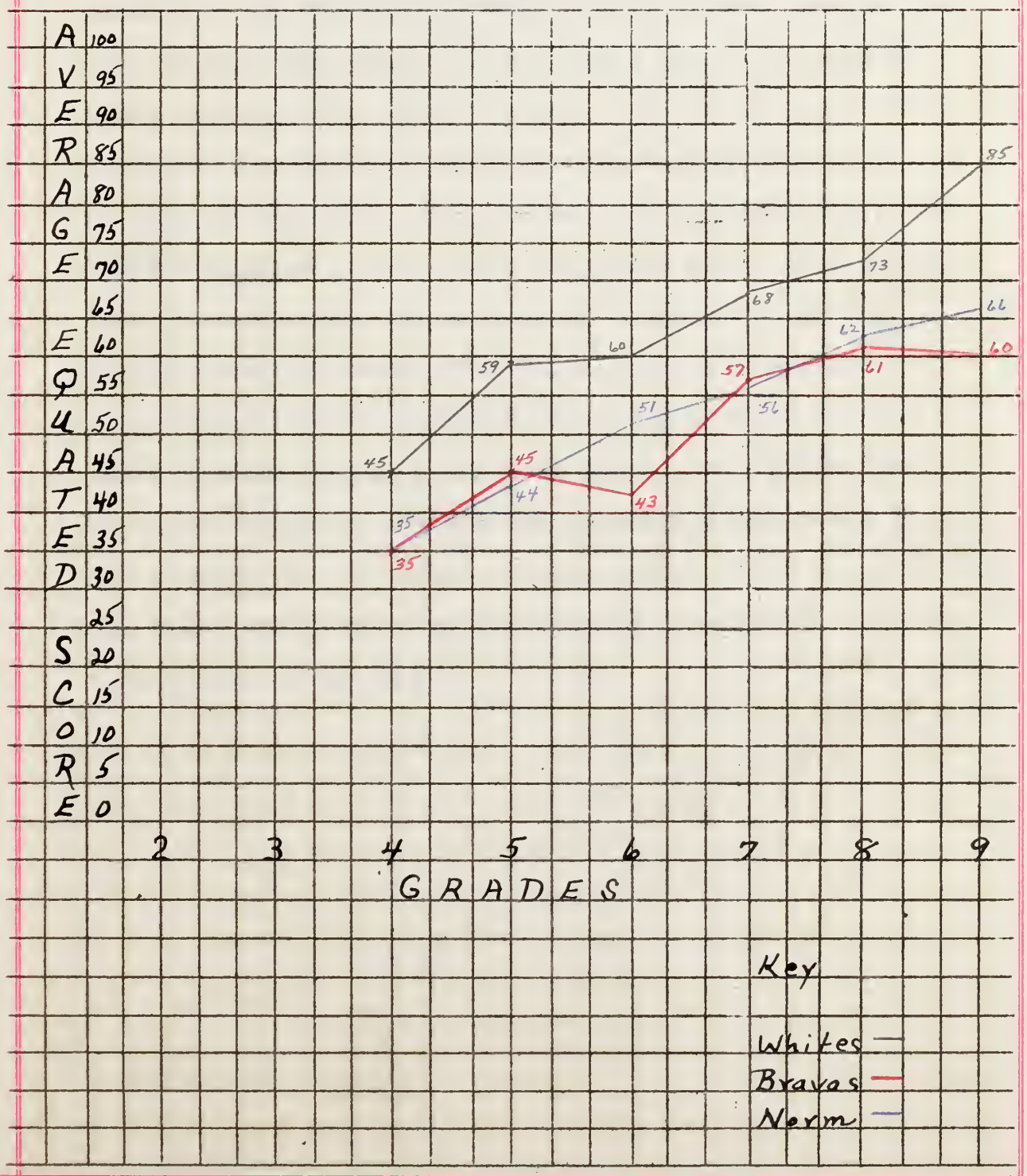
THE WHITE AND BRAVA RESULTS OF THE STANFORD ACHIEVEMENT TEST IN READING IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS MAY, 1940.



Graph 19 indicates that in grade 2 there is between the White and the Brava groups a difference of only 8 equated scores as compared to a difference of 30 scores in grade 9. The White achievement is therefore 4 times greater than the achievement of the Brava group in Reading (paragraph meaning plus word meaning) during the school career of each group. The Brava improves each year in Reading but is slow, reaching a plateau in grades 5 and 6 and again in grades 7 and 8. Up until the fourth grade both groups are above the norm, but at no time after that does the Brava reach or surpass the average. The Brava group shows the greatest achievement between grades 5 and 6 (14 scores) and the least between grades 7 and 8 (1 score) while the Whites show the greatest achievement between grades 8 and 9 (25 scores) and the least between grades 7 and 8 (3 scores). The White group's average annual achievement is 9.7 equated scores as compared to 6.5 for the Brava group. At no time does the White group fall below the norm, while in grade 9 the Brava group is 4 scores below the average.

GRAPH 20

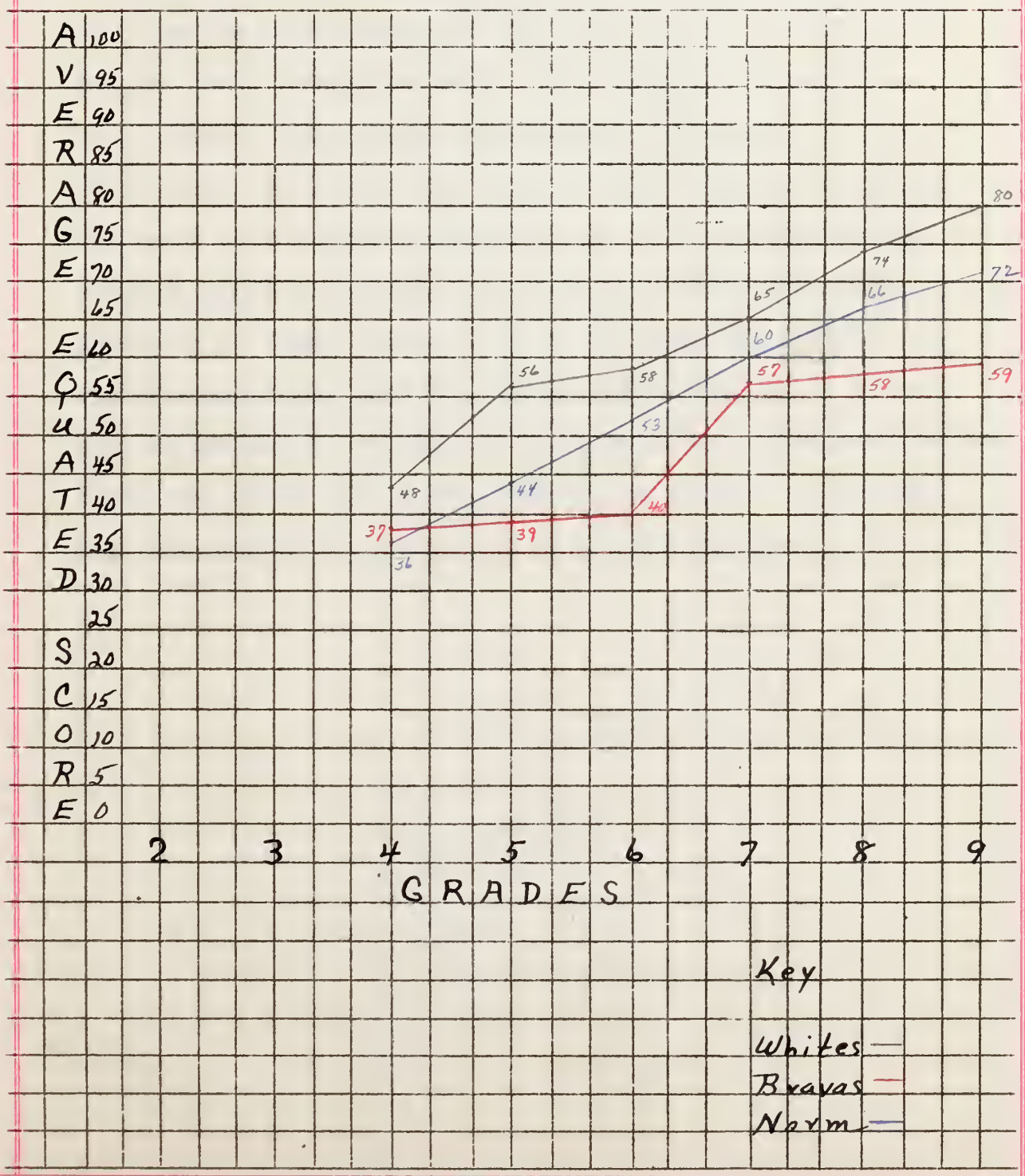
THE WHITE AND BRAVA RESULTS OF THE STANFORD ACHIEVEMENT TEST IN LANGUAGE USAGE IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS MAY, 1940.



Graph 20 indicates that in grade 4 ~~that~~ there is between the White and the Brava groups a difference of 10 equated scores as compared to a difference of 25 scores in grade 9. The White achievement is 2.5 times greater than the average achievement of the Brava group in Language Usage during their school career. The White group shows constant improvement, while the Brava group does not. At no time is the White group fewer than 9 scores above the average equated score, while the Brava group is never more than 1 score above and as many as 8 scores below the average equated score. The White shows the greatest achievement between grades 4 and 5 (14 scores) and the least between grades 5 and 6 (1 score), while the Brava shows the greatest achievement between grades 6 and 7 (14 scores) and the least between grades 5 and 6 (-2 scores). The Brava group shows no improvement in grade 9 over its achievement in grade 8.

GRAPH 21

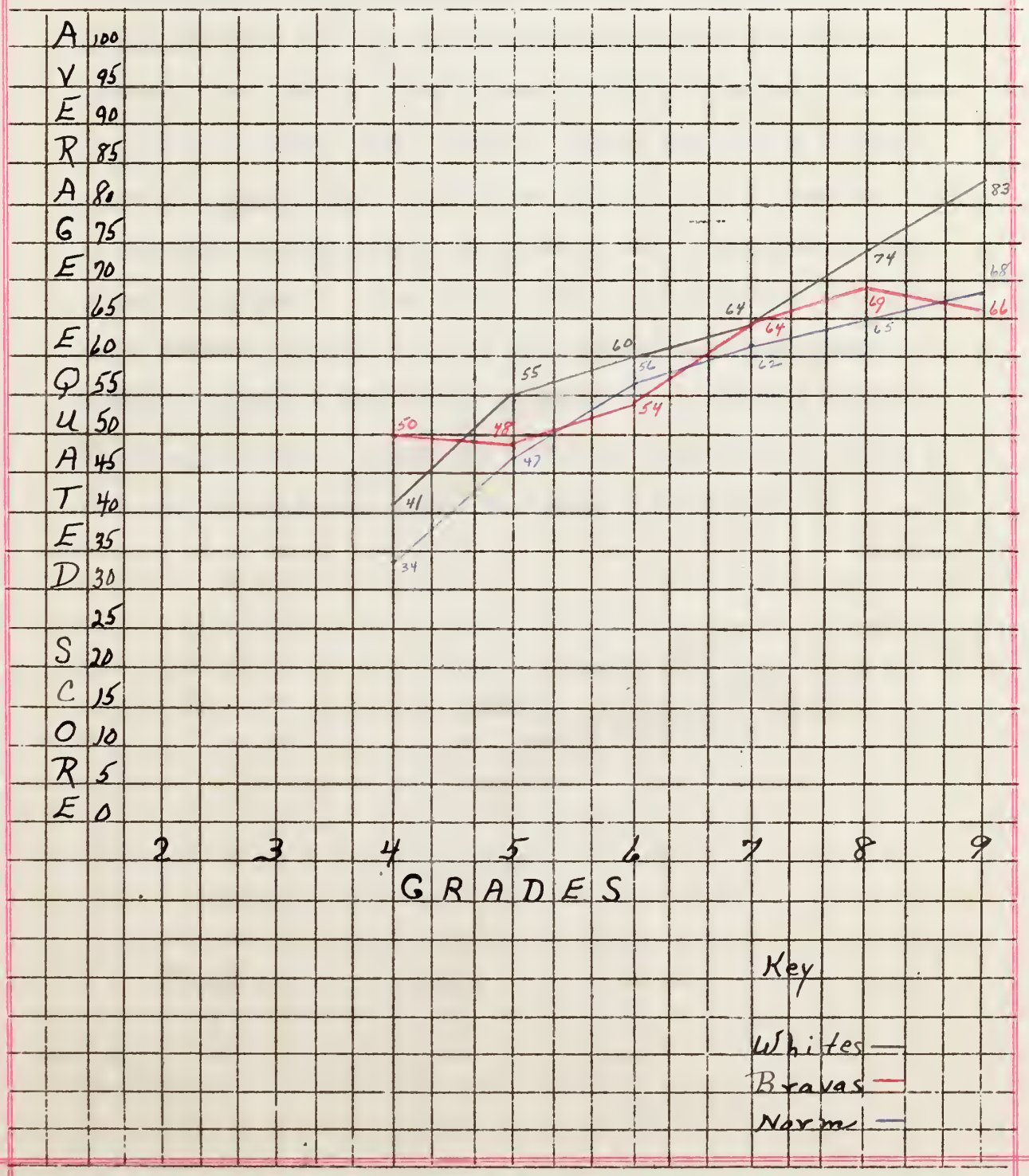
THE WHITE AND BRAVA RESULTS OF THE STANFORD ACHIEVEMENT TEST IN LITERATURE IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS MAY, 1940.



Graph 21 indicates that in grade 4 ~~that~~ there is between the White and the Brava groups a difference of 11 equated scores as compared to a difference of 21 scores in grade 9. The White achievement is 1.9 times greater than the average achievement of the Brava group in Literature during their school career. Both groups show constant improvement, but the annual average achievement of the White group is 1.2 scores greater than that of the Brava. The only time that the Brava group is above the average equated score is in grade 4 (1 score), while the White group is at least 5 scores above it in every grade. The Brava group shows little progress in grades 5, 6, 8 and 9 and the greatest in grade 7 (17 scores), as compared to the White, who shows the least progress in grade 6 (2 scores), and the greatest achievement in grade 8 (9 scores).

GRAPH 22

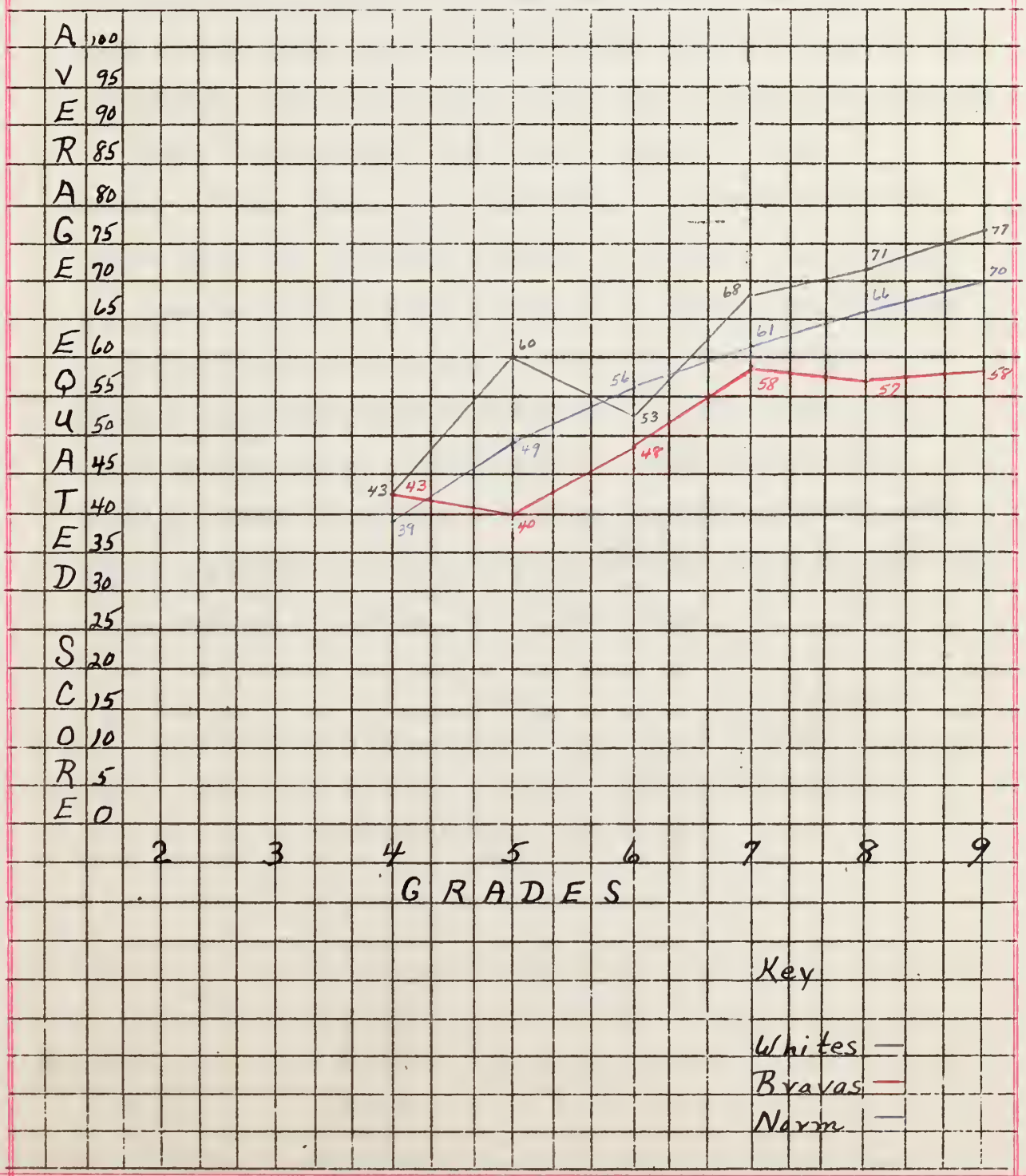
THE WHITE AND BRAVA RESULTS OF THE STANFORD ACHIEVEMENT TEST IN SPELLING IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS MAY, 1940.



Graph 22 indicates that in grade 4 the Brava surpassed the White by 9 scores, but in grade 9 the White group ranked 17 equated scores above the Brava group. The White group showed an improvement of 26 more equated scores in Spelling than did the Brava group during their school career. The White group shows a fairly constant improvement and is never fewer than 3 scores above the average equated score; while the Brava progress is irregular, being 16 equated scores above in grade 4 and 2 equated scores below in grade 9. The Brava shows the greatest achievement between grades 6 and 7 (9 scores) and the least between grades 4 and 5 (-2 scores), as compared to the White group which makes the greatest progress in grade 5 (14 scores) and the least in grade 7 (4 scores).

GRAPH 23

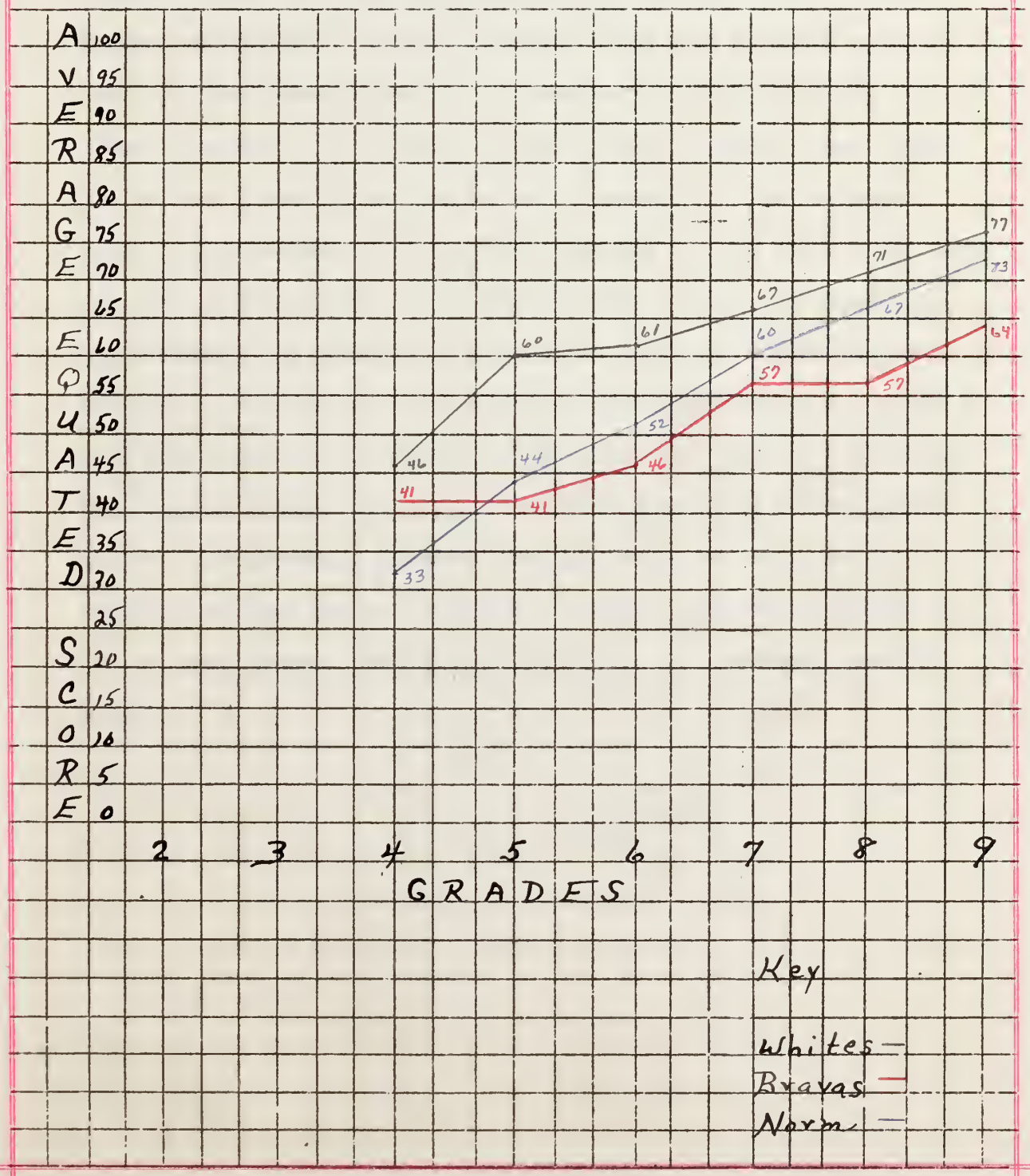
THE WHITE AND BRAVA RESULTS OF THE STANFORD ACHIEVEMENT TEST IN SOCIAL STUDIES IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS MAY, 1940.



Graph 23 indicates that in grade 4 there is no difference between the White and the Brava equated score, but that in grade 9 there is a difference of 19 scores. The White achievement is 19 scores greater than the achievement of the Brava group in the Social Studies (history and geography). The White group shows the greatest achievement in grade 7 (15 scores) and none in grade 6, where as a matter of fact there is a decrease, 7 scores; while the Bravas show the greatest progress in grade 7 (10 scores) and none in grade 5 with a loss of 3 scores. The progress of both groups is irregular. The only time the Brava is above the average equated score is in grade 4 when they are 4 scores above. In grade 9, he makes the poorest showing, being 12 scores below the average equated score. In grades 8 and 9 the White group shows normal progress, but the Brava reaches a plateau in his learning.

GRAPH 24

THE WHITE AND BRAVA RESULTS OF THE STANFORD ACHIEVEMENT TEST IN ELEMENTARY SCIENCE IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS MAY, 1940.



Graph 24 indicates that in grade 4 both the White and the Brava groups were above the average equated score and that there is a difference of 5 equated scores as compared to a difference of 13 scores in grade 9. The White achievement is 1.8 greater than the average achievement of the Brava group in Elementary Science during their school career. The White group shows progress each year, while the Brava progress is not constant. The average annual achievement of the White group is 1.6 more than that for the Brava group. The White group shows the greatest achievement in grade 5 (14 scores) and the least in grade 6 (1 score), while the Brava shows no improvement in grade 8 and the greatest in grade 7 (11 scores). At no time after the fourth grade has been completed does the Brava group attain the average equated score, being as many as 9 equated scores below in grade 9; while the White group is at no time fewer than 4 scores above the average equated score.

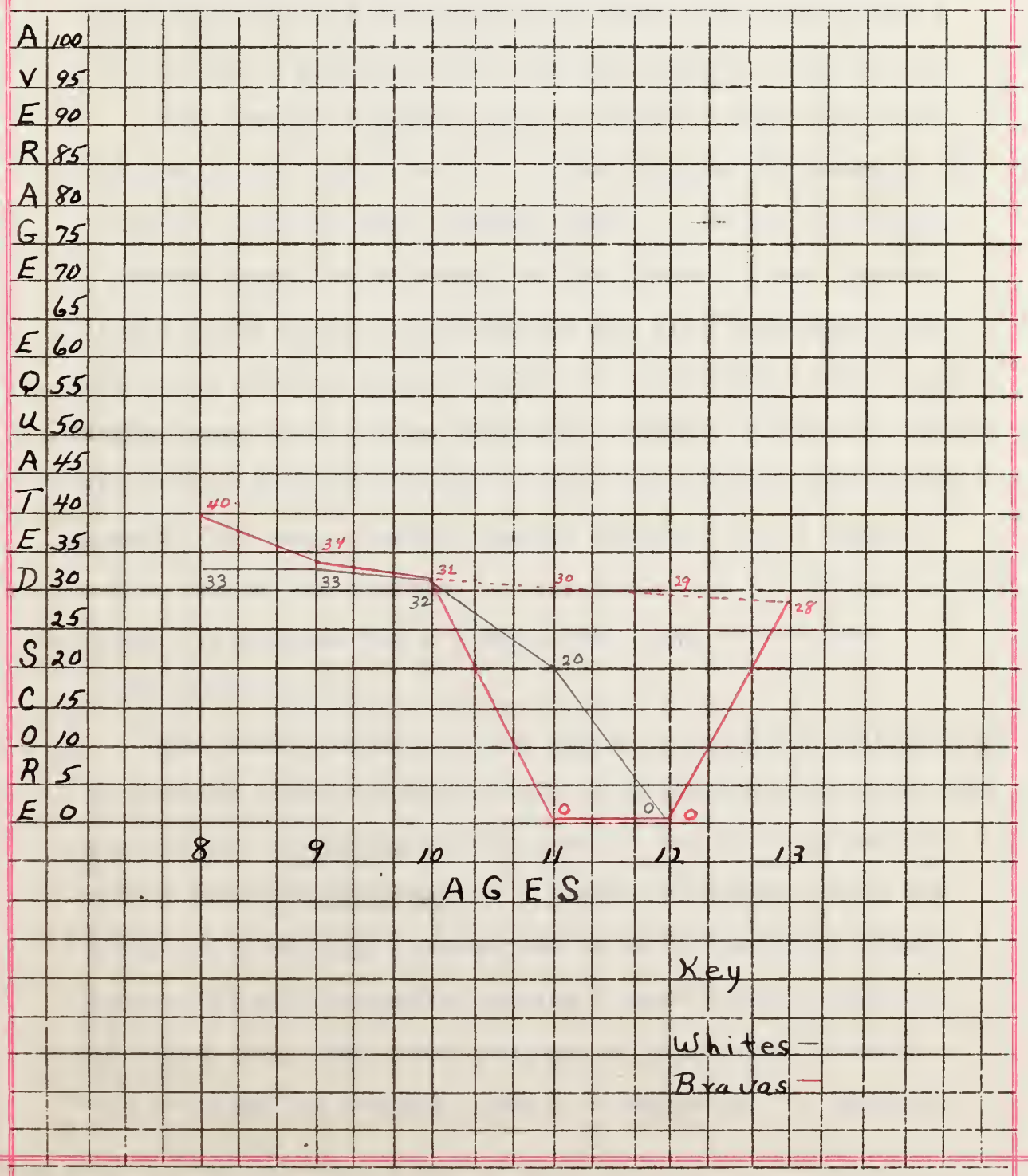
CHAPTER V

CHRONOLOGICAL AGES AND THE STANFORD ACHIEVEMENT TESTS

Teachers have learned through the repeated use of tests something of the significance of age and grade equivalents, the result of tests scores, and these provide meaningful points of reference for guidance in the understanding of test results. In order to determine which pupils were at the average grade level for their age, distributions were made of the chronological ages of all pupils in grades 3, 6 and 9 respectively. In classifying the members of each age group, the following plan was utilized: anyone whose chronological age happened to be between 7 years,6 months and 8 years, 5 months has been classified as 8 years. The same plan has been used in comparing the average equated grade score of the Marion school children with the standard equated grade scores as established by the Stanford Achievement Test. The average equated scores as attained by both the Whites and Bravas in each age and grade group have been computed so that they may be compared with the standard equated scores as established by the Stanford Achievement Test for the grades which have been considered.

GRAPH 25

THE WHITE AND BRAVA RESULTS (AVERAGED) IN THE STANFORD ACHIEVEMENT TEST ACCORDING TO CHRONOLOGICAL AGES IN GRADES 3 IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS MAY, 1940.



Graph 25 indicates that there is a range of 5 years (8--13) in the chronological ages of the members of grades 3. The White range is from 8-11 years as compared to 8-13 for the Brava group. The standard average age equivalent as established by the Stanford Achievement Test for grade 3 is 9 years, 1 month, and the average equated score is 38.

The average equated score of those 8 year old White members of the class is 33, 5 scores below the average, as compared to an average equated score of 40 for the Bravas, 2 scores above the average for the grade. Those members of the class whose chronological age is 9 attained scores below the average equated score for the grade; that is the White group is 5 scores below the average, while the Bravas are 4 scores below. In the 10 year old group, both groups secured the same average equated score of 32, 6 equated scores below the average for the grade but 19 equated scores below the average for a person with that particular chronological age.

The White members of the class 11 years old established an average equated score of 20, 18 equated scores below the average for the grade or the equated score for a person with a chronological age of 7 years, 5 months, while the Brava group was not represented in this age grade group. Chronologically speaking, grades 3 were without members 12 years old. The Brava members of the group 13 years old attained an average equated score of 28, 10 equated

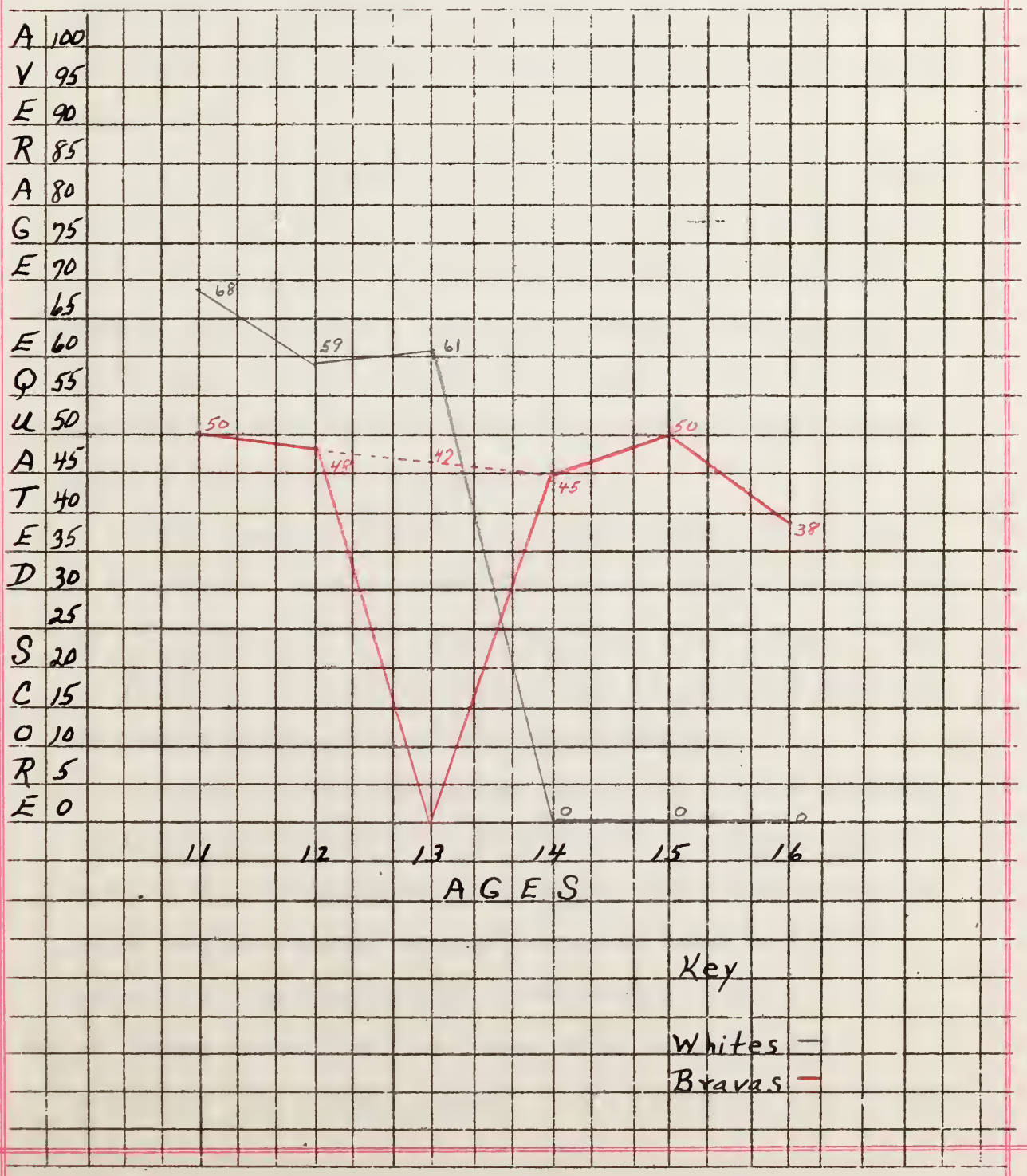
scores below the average equated score of a person with a chronological age of 8 years, 3 months, while the White group lacked representation.

The average equated score for all the Brava members of the grade is 22, 16 equated scores below normal, as compared to the average equated score of all the Whites 30, 8 scores below the standard for the grade.

Thus, the average equated score of the Brava is twice as far below the standard average equated score as is the average equated score of the White.

GRAPH 26

THE WHITE AND BRAVA RESULTS (AVERAGED) IN THE STANFORD ACHIEVEMENT TEST ACCORDING TO CHRONOLOGICAL AGES IN GRADES 6 IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS MAY, 1940.



Graph 26 indicates that there is a range of 5 years (11-16) in the chronological ages of the members of grades 6. The White range is from 11-13 years as compared to 11-16 for the Brava group. The standard average age equivalent as established by the Stanford Achievement Test for grades 6 is 11 years, 10 months, and the average equated score is 78.

The average equated score of those 11 year old White members of the class is 68, 10 scores below the average equated score of 50 for the Brava, 28 scores below the average for the grade. Thus, the average equated score of the 11 year old Brava is nearly 3 times as far below the standard average equated score as is the average equated score of the Whites of the same age.

Those members of the class whose chronological age is 12 attained scores below the average equated score; that is, the White group is 18 scores below the average, while the Brava is 30 scores below; or the 12 year old Bravas are nearly twice as far below the standard.

In the 13 year old group, the Bravas lacked representation, while the White group attained an average equated score of 61, 17 equated scores below the average for the grade, and 24 equated scores below the average for a person with that particular chronological age.

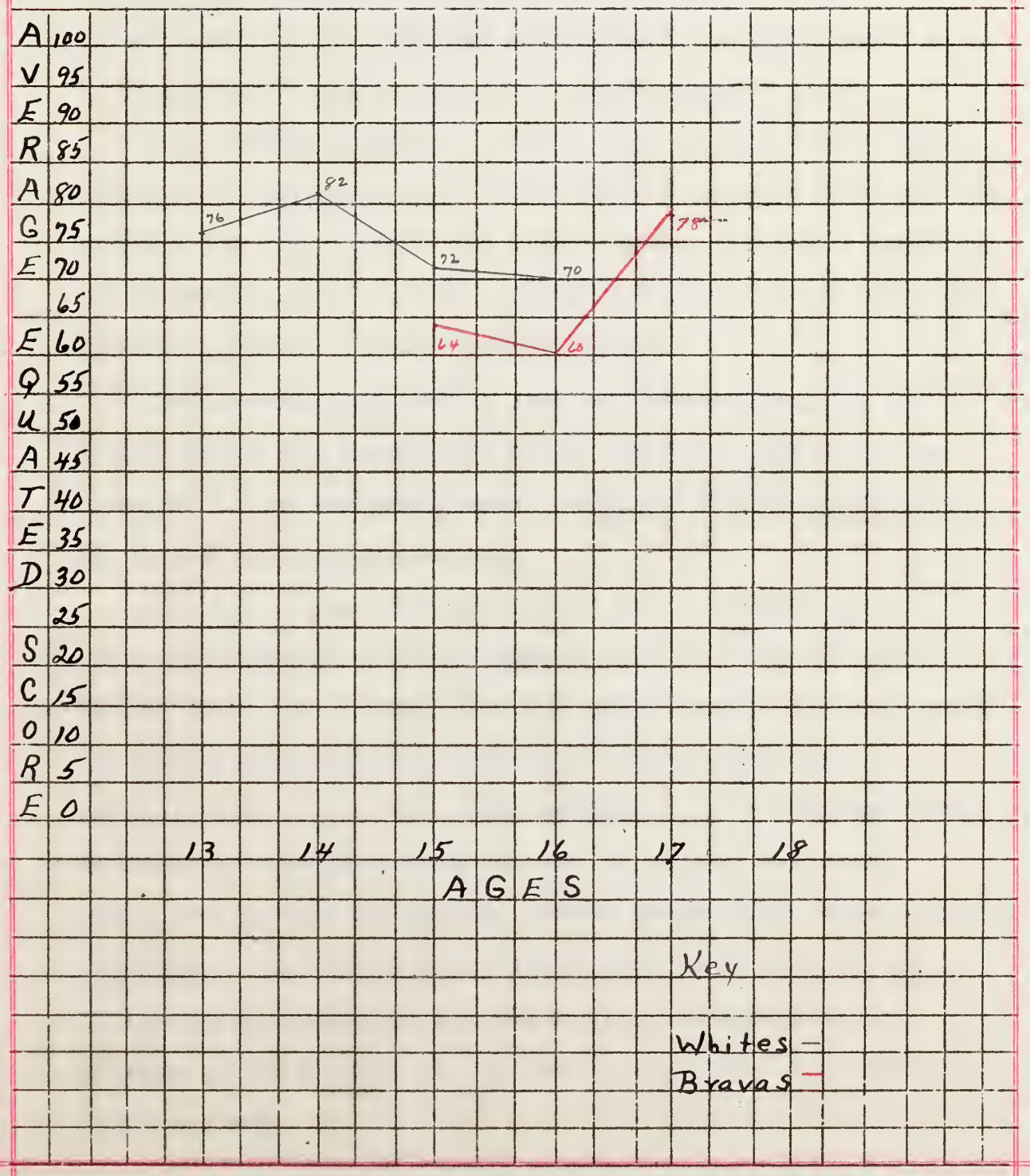
Those members of the Brava group 14 years old established an average equated score of 45, 33 scores below

the average. The 15 year old Brava group attained an average score of 50, 28 scores below the average; while the 16 year old members of the same group attained an average of 38 scores, 40 scores below the average equated score for the grade.

The average equated score for all the Brava members of the grade is 39, 39 equated scores below normal, as compared to the average equated score established by the White members of the grade 63, which is 15 scores below the standard for the grade. In other words, the average equated score as established by the Brava group is 2.6 times farther below the standard average equated score.

GRAPH 27

THE WHITE AND BRAVA RESULTS (AVERAGED) IN THE STANFORD ACHIEVEMENT TEST ACCORDING TO CHRONOLOGICAL AGES IN GRADE 9 IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS MAY, 1940.



Graph 27 indicates that there is a range of 5 years (13-17) in the chronological ages of the members of grade 9. The White range is from 13-16 years as compared to 15-17 for the Brava group. The standard age equivalent as established by the Stanford Achievement Test for grade 9 is 15 years, 4 months, and the average equated score is 98.

The average equated score of those 13 year old White members of the class is 76, 22 scores below the average; the average for the 14 year old group is 82, 16 scores below the average equated score. In both the 13 and 14 year age groups the Brava lacked representation.

The average for the 15 year old White group is 72, 26 scores below the average as established for the grade as compared to an average equated score of 64 for the Bravas, 35 scores below the average.

In the 16 year old group, the White members of the class attained an average equated score of 70, 28 equated scores below the average for the grade and 33 equated scores below the average for a person with that particular chronological age. The Brava members of the same age group attained an average of 60 scores, 38 scores below the grade average and 43 equated scores below their chronological age group. The White group lacks representation in the 17 age grade group but the Brava group established an average of 78 scores, 20 equated scores below the average for the grade.

The average equated score for all the Brava members of the grade is 61, 37 equated scores below the standard equated score as compared to the average equated score established by the White members of the grade 75, which is 23 scores below the standard for the grade.

In other words, the average equated score as established by the Brava group is 1.6 times farther below the standard average equated score.

CHAPTER VI

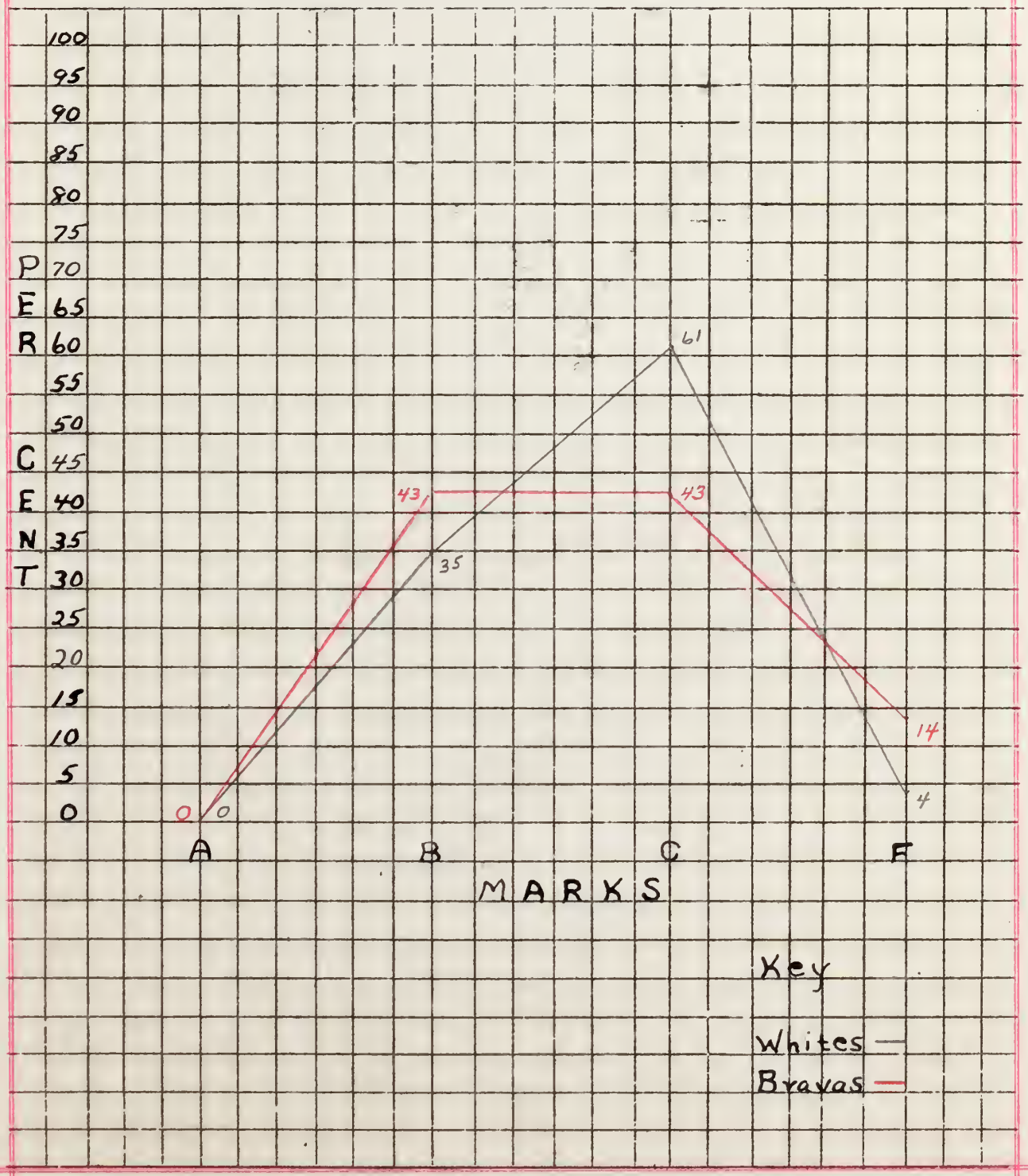
MARKS IN GRADES 3 - 6 - 9

It is well to note at this time the marking system, as it exists in the Marion Schools. There are 5 possible grades to be attained: A, 100--90; B, 89--80; C, 79--70; C-, 69--67; F, 66--0. In the comparison of marks C- has been classified as a C. The marks used in this survey were taken from the permanent record cards of the members of grades 3, 6 and 9 respectively as of the school year 1940 and represent a typical summary of the average final marks received by both the White and the Brava groups in the major subject fields.

(Note---It is essential to keep in mind the fact that as the Brava group progresses, their numbers as to grade enrollment decrease; thus, the statistics in the upper grades are based on a fewer number of cases.)

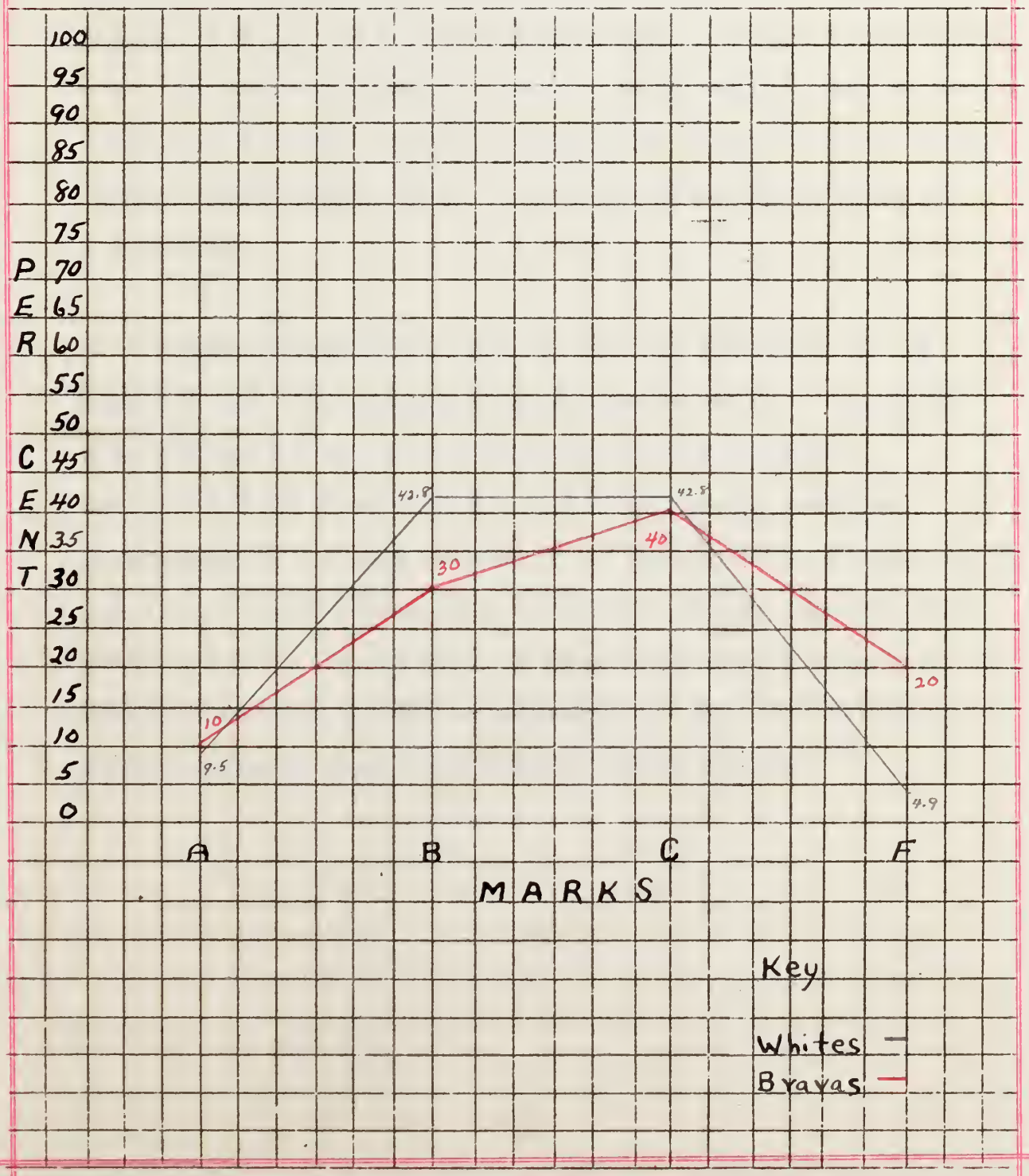
GRAPH 27 (A)

THE PER CENT OF A'S, B'S, C'S, AND F'S GIVEN TO THE WHITE AND BRAVA PUPILS IN READING IN GRADES 3 OF THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



GRAPH 28

THE PER CENT OF A'S, B'S, C'S, AND F'S GIVEN TO THE WHITE AND BRAVA PUPILS IN READING IN GRADES 6 OF THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



Graph 27A indicates that 43 % or approximately 2/5 of the Brava group received C's, while 61 % or approximately 3/5 of the Whites received the same mark. Ten per cent (10%) more of the Whites received either B's or C's, Whites 96 %-Bravas 86 %, and 10 % more Bravas failed, Bravas 14 %--Whites 4 %. In the C-F group we find 8 % more Whites, Whites 65 %-Bravas 57 %, while in the A-B group we find 8 % more Bravas, Bravas 43 %--Whites 35%. In neither group do we find any A students.

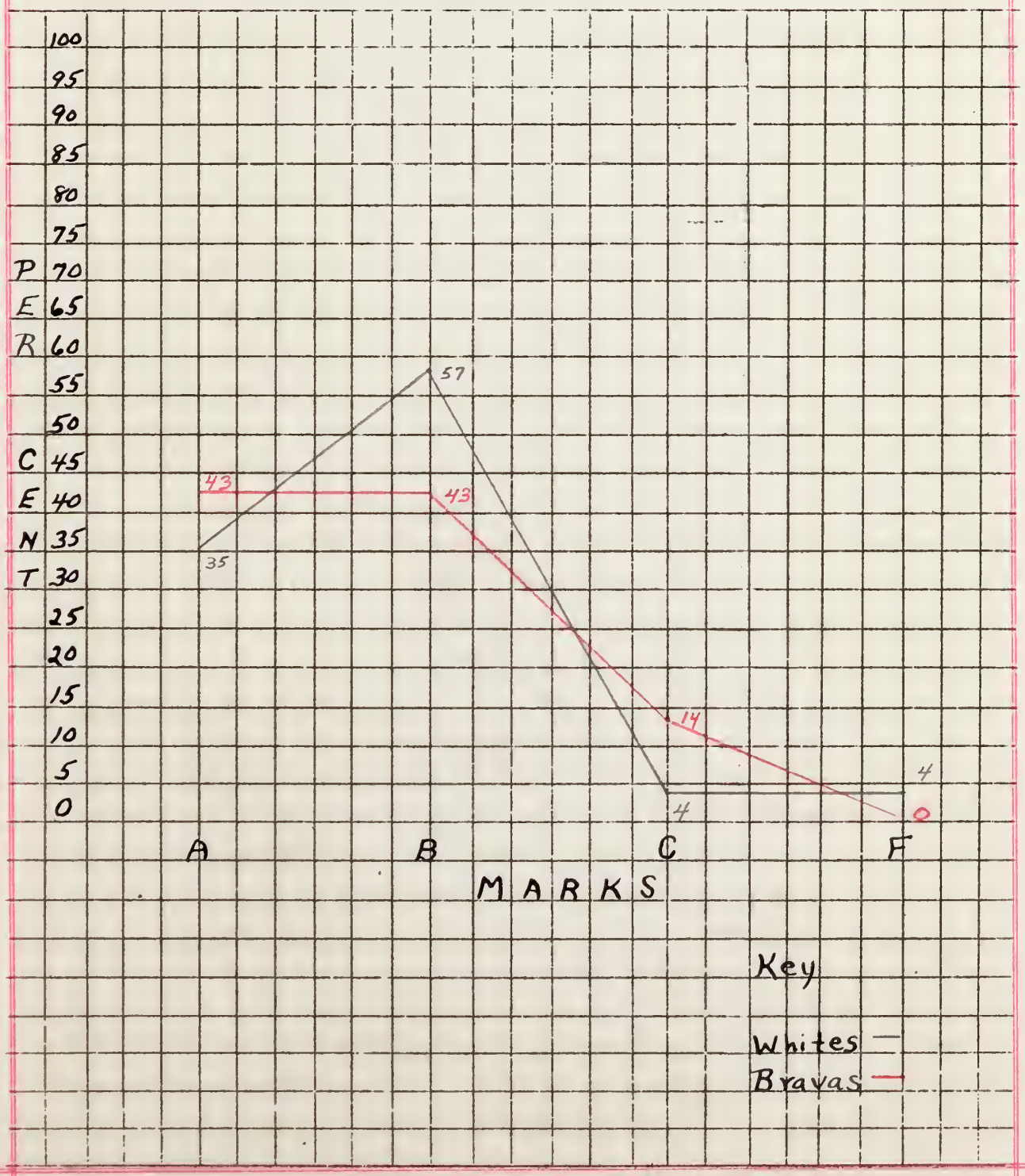
Graph 28 indicates that the Whites received 12.3 % more A's and B's, Whites 52.3 %--Bravas 40 %; .5 % fewer A's, Whites 9.5 %--Bravas 10 % and 12.8 % more B's, Whites 42.8 %--Bravas 30 %. The Brava group received approximately 4 times as many F's, Bravas 20 %--Whites 4.9 %, and 12.3 % more Bravas were in the C-F group, Bravas 60 %--Whites 47.7 %. It is well to note that 95.1 % of the Whites received passing grades as compared to 80 % for the Bravas, which indicates that 15.1 % more Bravas failed.

A Summary On Reading Marks.

An analysis of the Reading marks indicates that the Brava has difficulty in mastering the subject. In grades 3, 14 % failed as compared to 20 % in grades 6; 6 % more failed in grades 6 than failed in grades 3. In the third grades, 43 % got C's while in grades 6, 40 % attained the same mark. Forty-three per cent (43 %) got B's in grades 3 as compared to 30 % in grades 6, while 10 % of the Brava group received A's in grades 6. No one in either the White or the Brava group received the mark of A in grades 3. In grades 3,10% more Bravas failed than did Whites, Bravas 14 %--Whites 4 %, while in grades 6, 15.1 % more Bravas received a similar mark, Bravas 20 %--Whites 4.9 %, than did the White group.

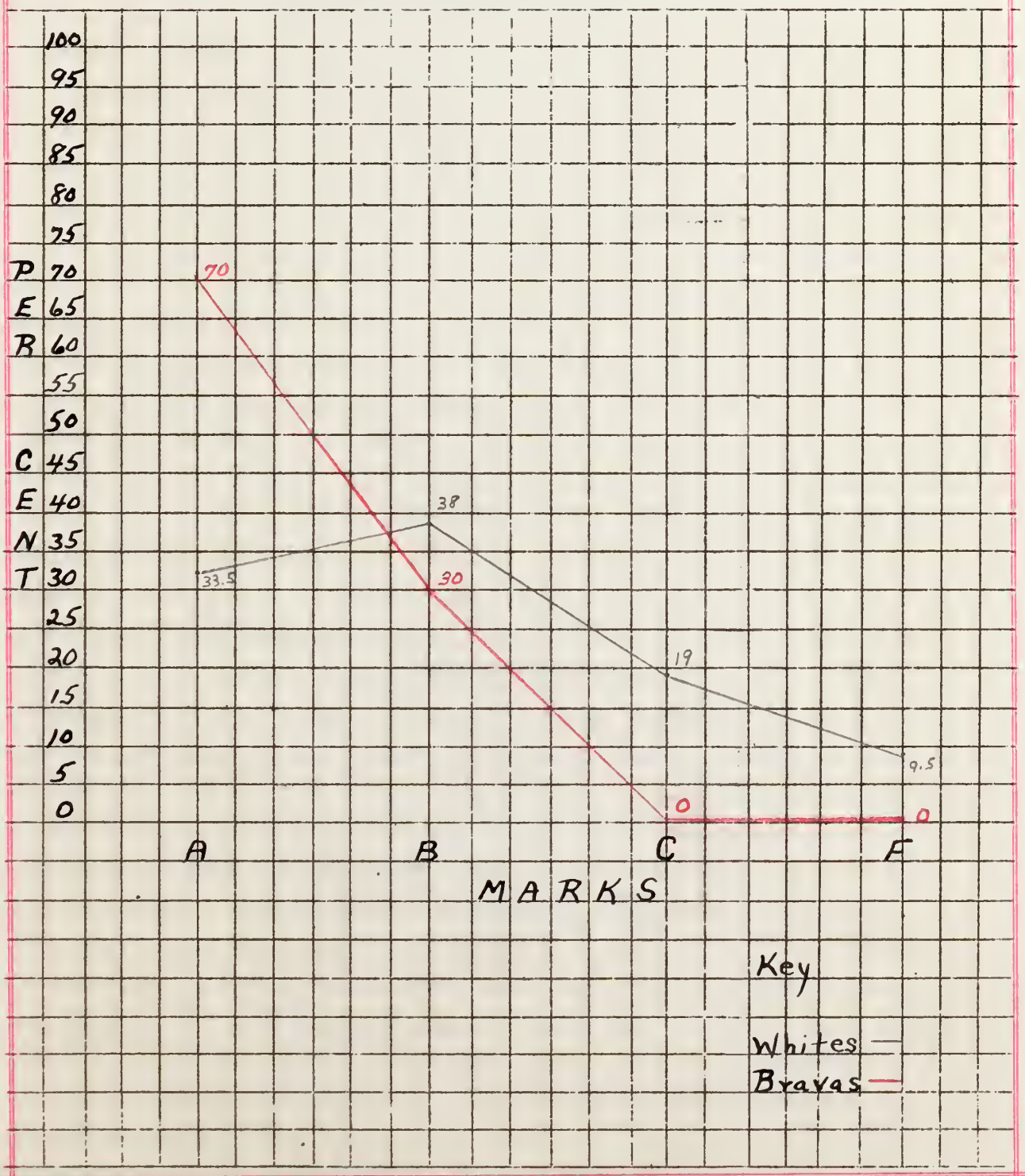
GRAPH 29

THE PER CENT OF A'S, B'S, C'S, AND F'S GIVEN TO THE WHITE AND BRAVA PUPILS IN SPELLING IN GRADES 3 OF THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



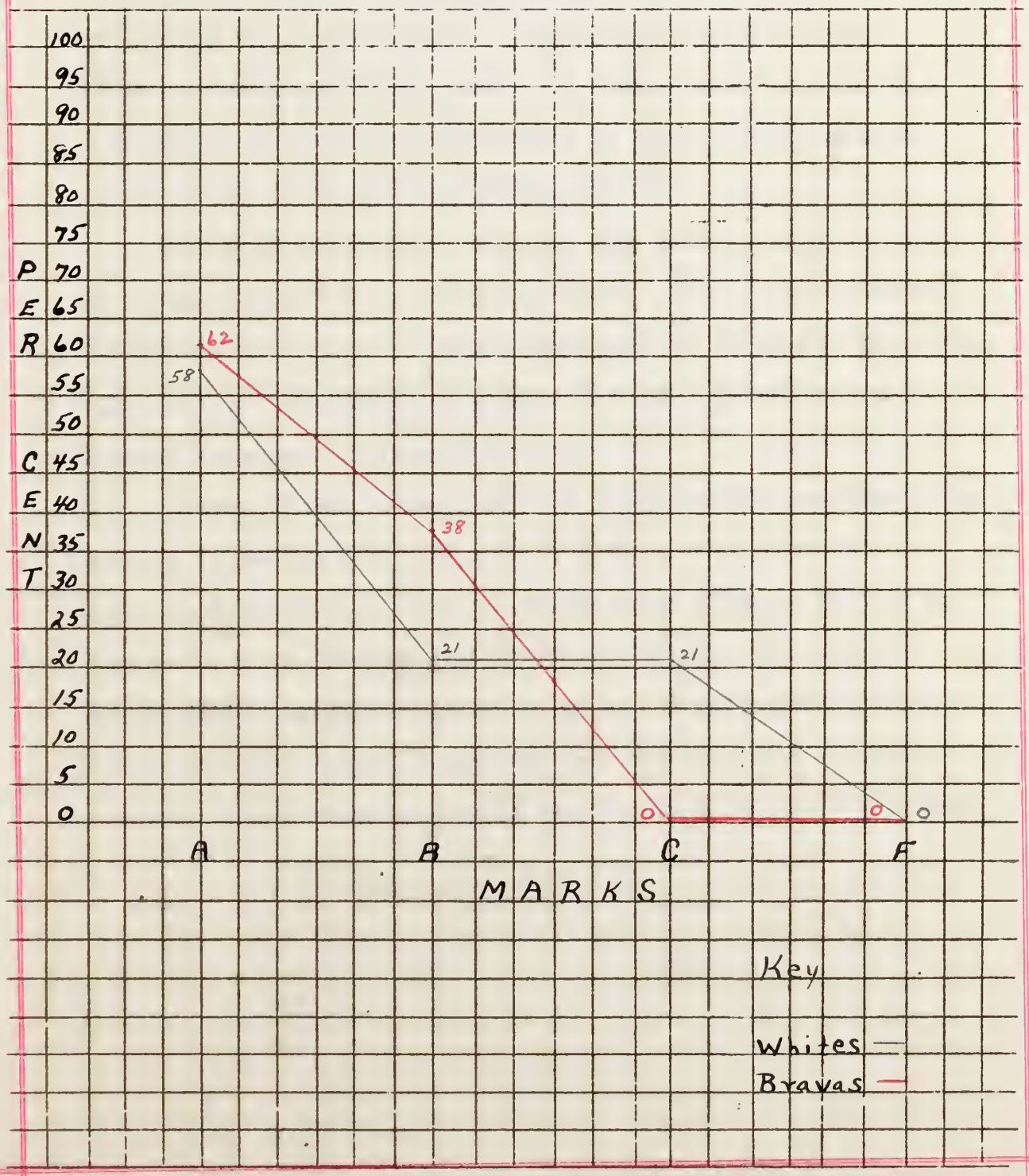
GRAPH 30

THE PER CENT OF A'S, B'S, C'S, AND F'S GIVEN TO THE WHITE AND BRAVA PUPILS IN SPELLING IN GRADES 6 OF THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



GRAPH 31

THE PER CENT OF A'S, B'S, C'S, AND F'S GIVEN TO THE WHITE AND BRAVA PUPILS IN SPELLING IN GRADE 9 OF THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



Graph 29 indicates that approximately 8 % more Bravas received A's, Bravas 43 %--Whites 35 %. Fourteen per cent (14 %) more Whites received B's, Whites 57 %--Bravas 43 %, and 6 % more Whites received either A's or B's, Whites 92 % Bravas 86 %. Although 10 % more Bravas received C's, White 4 %--Bravas 14 %, only 6 % more Bravas are in the C-F group, Bravas 14 %--Whites 8 %, due to the fact that the F group lacks Brava representation.

Graph 30 indicates that all the Bravas were in the A-B group, 28.5 % more Bravas received A's or B's, Bravas 100 %--Whites 71.5. Twenty-eight and five-tenths per cent (28.5 %) of the Whites received C's or F's while the Bravas were not represented.

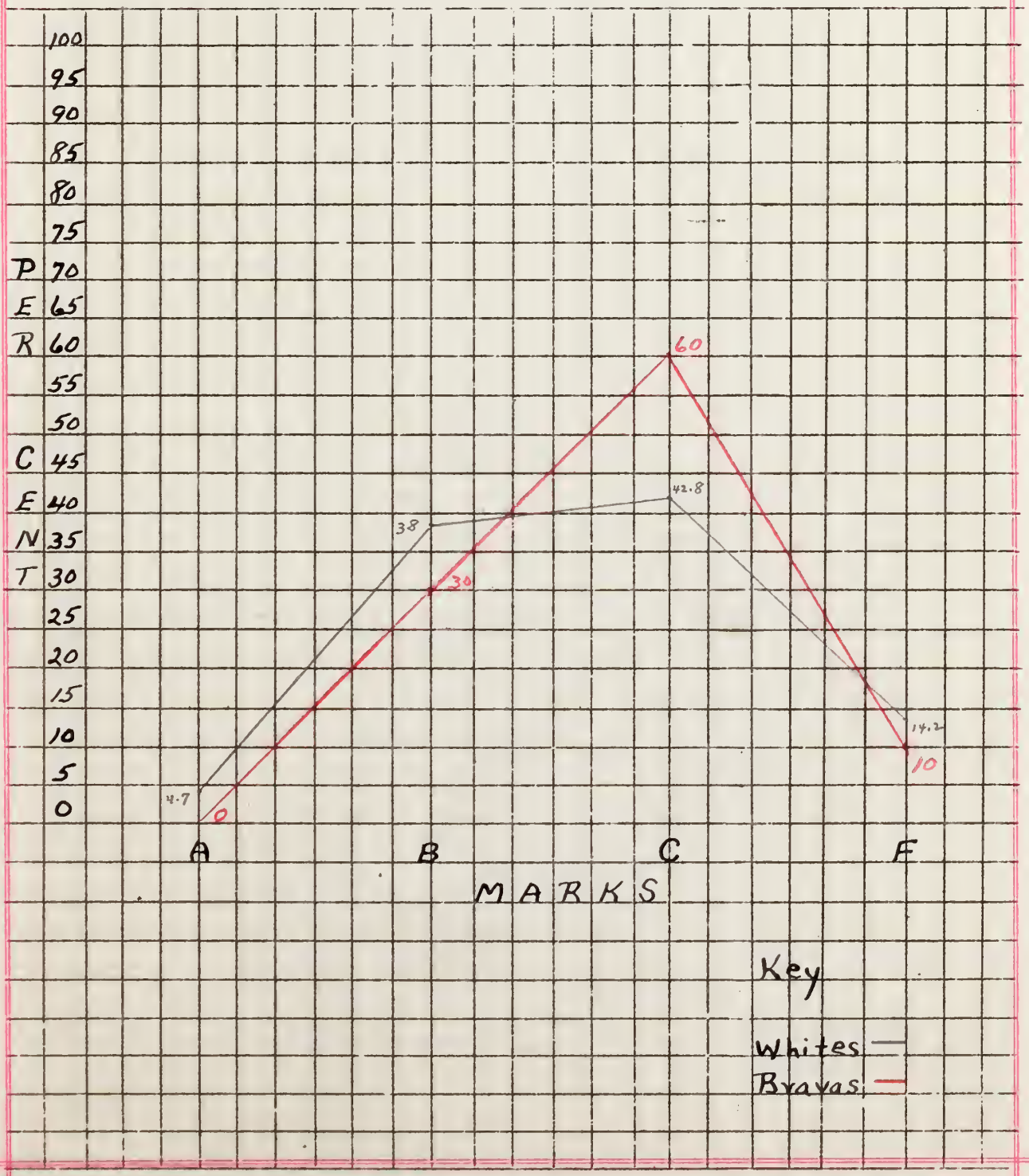
Graph 31 indicates that 4 % more Bravas received A's, Bravas 62 %--Whites 58 %, and 17 % more received B's, Bravas 38 %--Whites 21 %, or there were 21% more Bravas in the A-B group, Bravas 100 %--Whites 79 %. The entire Brava group received either A or B. Twenty-one per cent (21 %) of the Whites received C's, while not a single member of the Brava group is represented in the C-F group.

A Summary On Spelling Marks.

Spelling is a strong subject for the Brava group. There is gradual improvement as the preceeding graphs indicate, In grades 3, 14 % received a mark of C but in both grades 6 and 9 the lowest mark attained was a B. The number of A's received further supports the above statement: in grades 3, 43 %; grades 6, 70 % and in grade 9, 62 %. In grade 9 there is 100% Brava representation in the A-B group as compared to only 86 % in grades 3, an improvement of 14 % in 6 grades. Likewise, in grade 9 the Brava group lacks representation in the C-F group as compared to 14 % in grades 3, a decrease of 14 % in 6 grades.

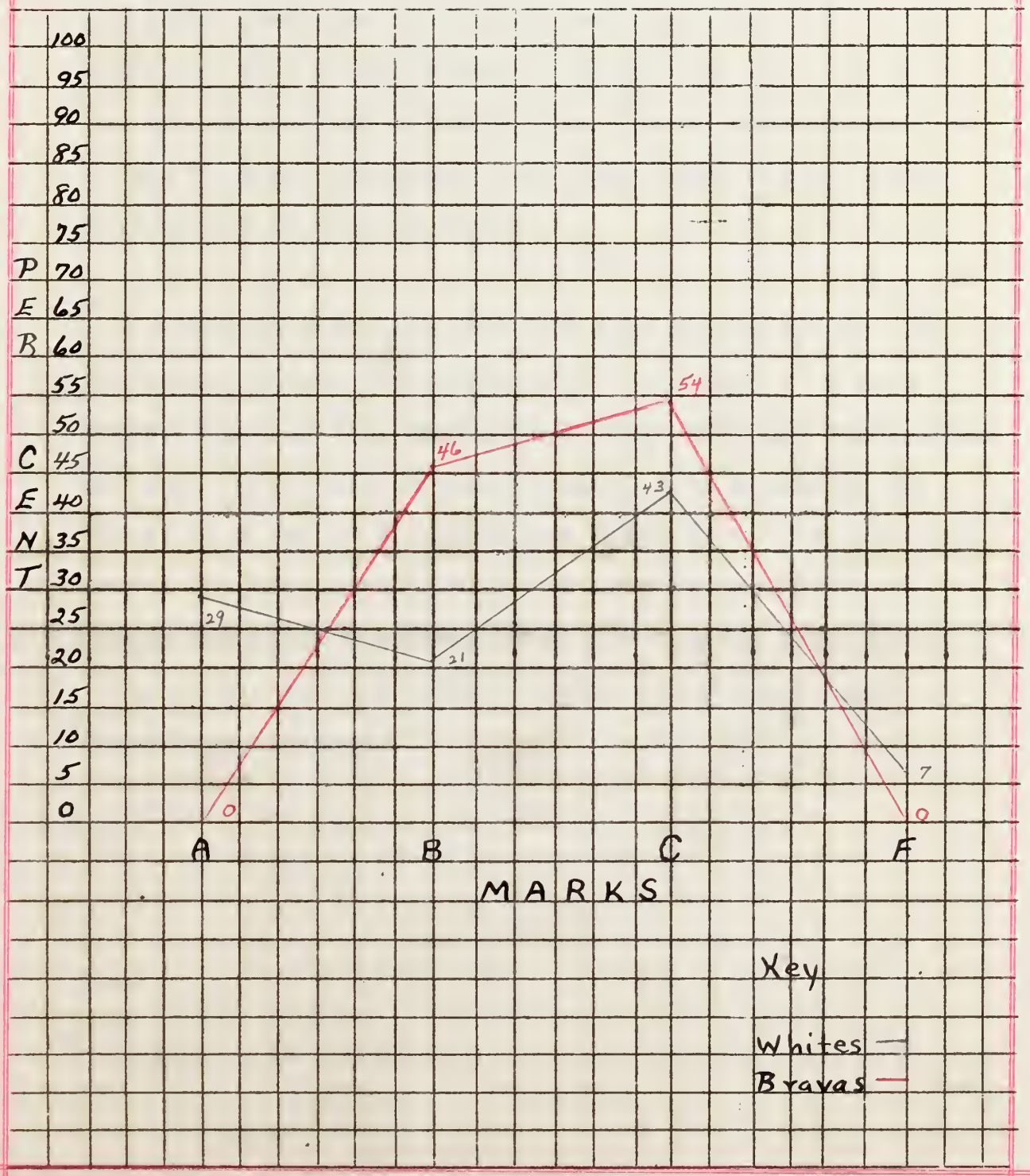
GRAPH 32

THE PER CENT OF A'S, B'S, C'S, AND F'S GIVEN TO THE WHITE AND BRAVA PUPILS IN LANGUAGE IN GRADES 6 OF THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



GRAPH 33

THE PER CENT OF A'S, B'S, C'S, AND F'S GIVEN TO THE WHITE AND BRAVA PUPILS IN LANGUAGE IN GRADE 9 OF THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



Graph 32 indicates that 3/5 of the Brava group received C's. Not one Brava received an A, while 5 % of the Whites in the same class received that mark. In the A-B group there are 42.7 % of the Whites and 30 % of the Bravas or 12.7 % more Whites. Seventy per cent (70 %) of the Bravas received either C's or F's as compared to 57 % of the Whites, which means that there are 13 % more Bravas than Whites in the C-F group.

Graph 33 indicates that 4 % more Bravas are in the C-F group, Bravas 54 %--Whites 50 %, although 11 % more Bravas received C's, Bravas 54 %--Whites 43 %. Twenty-five per cent (25 %) more Bravas received B's, Bravas 46 %--Whites 21 %, and 29 % more Whites received A's, Whites 29 % Bravas 0 %, but there are only 4 % more Whites in the A-B group, Whites 50 %--Bravas 46 %. The entire Brava group falls within the B-C bracket, while the F group lacks Brava representation.

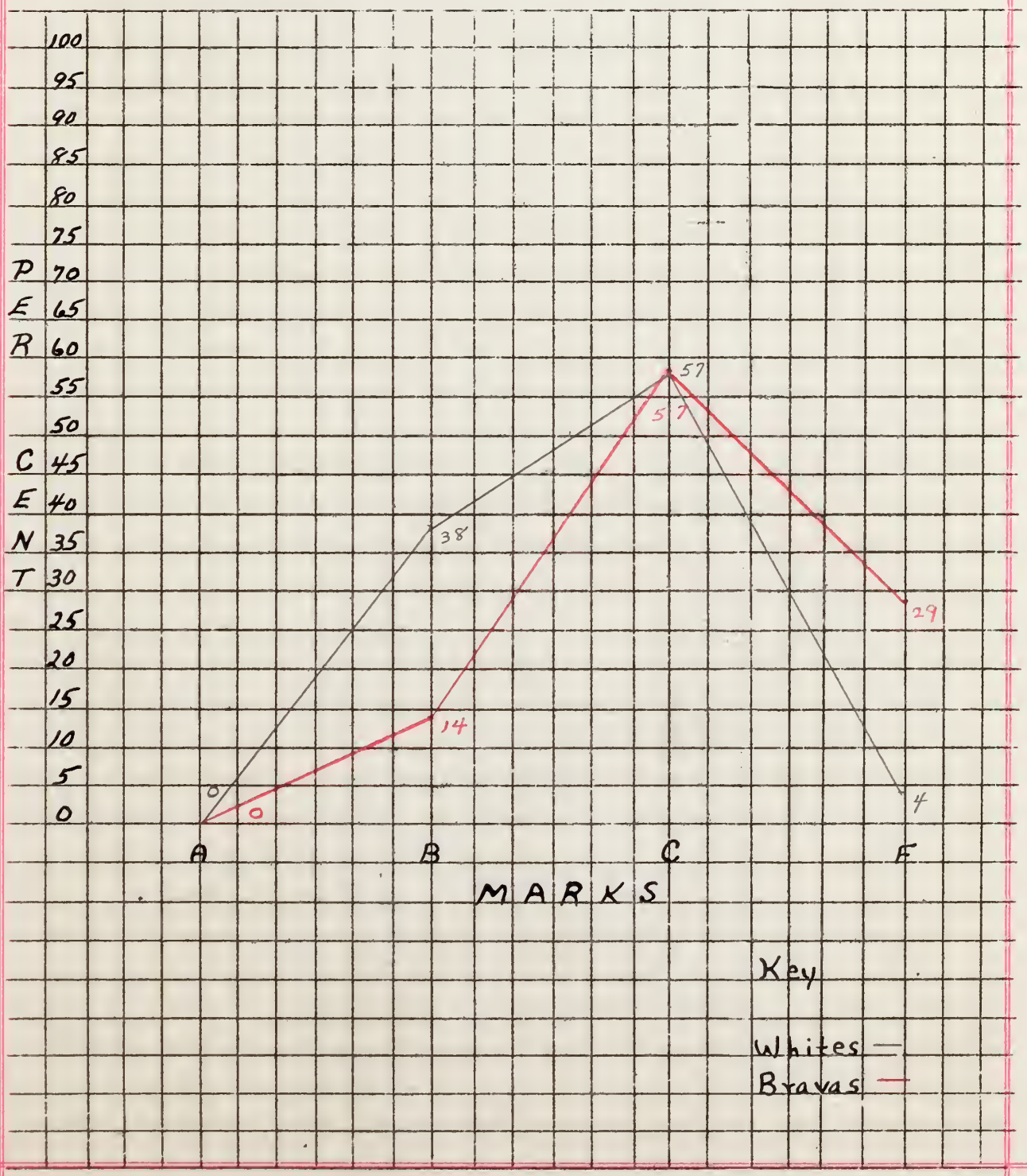
A Summary On English Marks.

An analysis of the English marks indicates a slight improvement (10%) in the mastery of English by the Brava group in grades 6 and 9 respectively. In grades 6, 10 % failed or received a mark of F, while in grade 9 no one received a mark lower than C. Thirty per cent (30%) of the Bravas received B's in grades 6 as compared to 46 % in grade 9 but 6 % more received C's in grades 6 (60%) than in grade 9 (54%).

In grade 9 there is 10 % greater representation (100%) in the B-C group than in grades 6 (90 %). There is 16 % greater Brava representation in the C-F group in grades 6 (70 %) than there is in grade 9 (54 %).

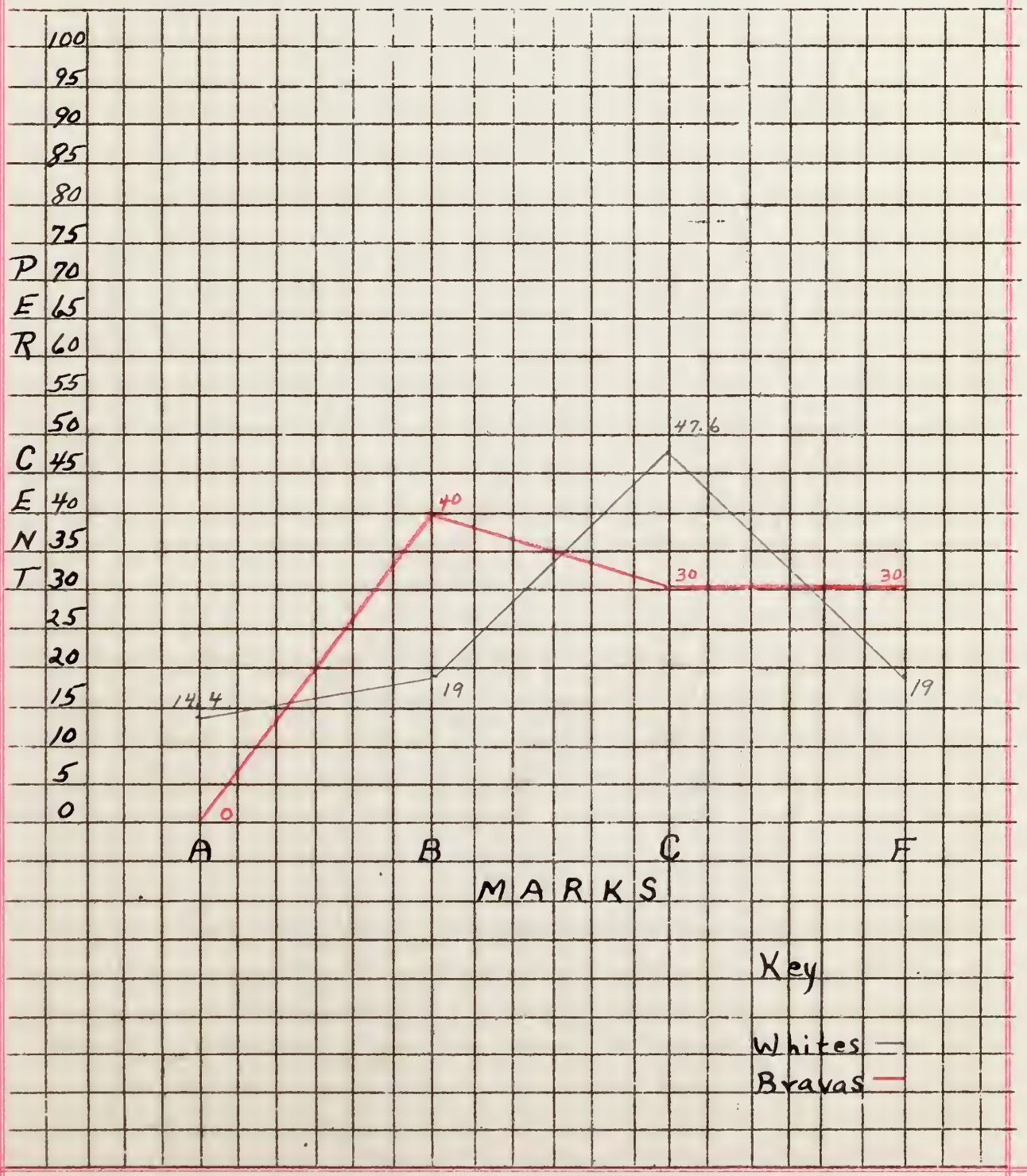
GRAPH 34

THE PER CENT OF A'S, B'S, C'S, AND F'S GIVEN TO THE WHITE AND BRAVA PUPILS IN ARITHMETIC IN GRADES 3 OF THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



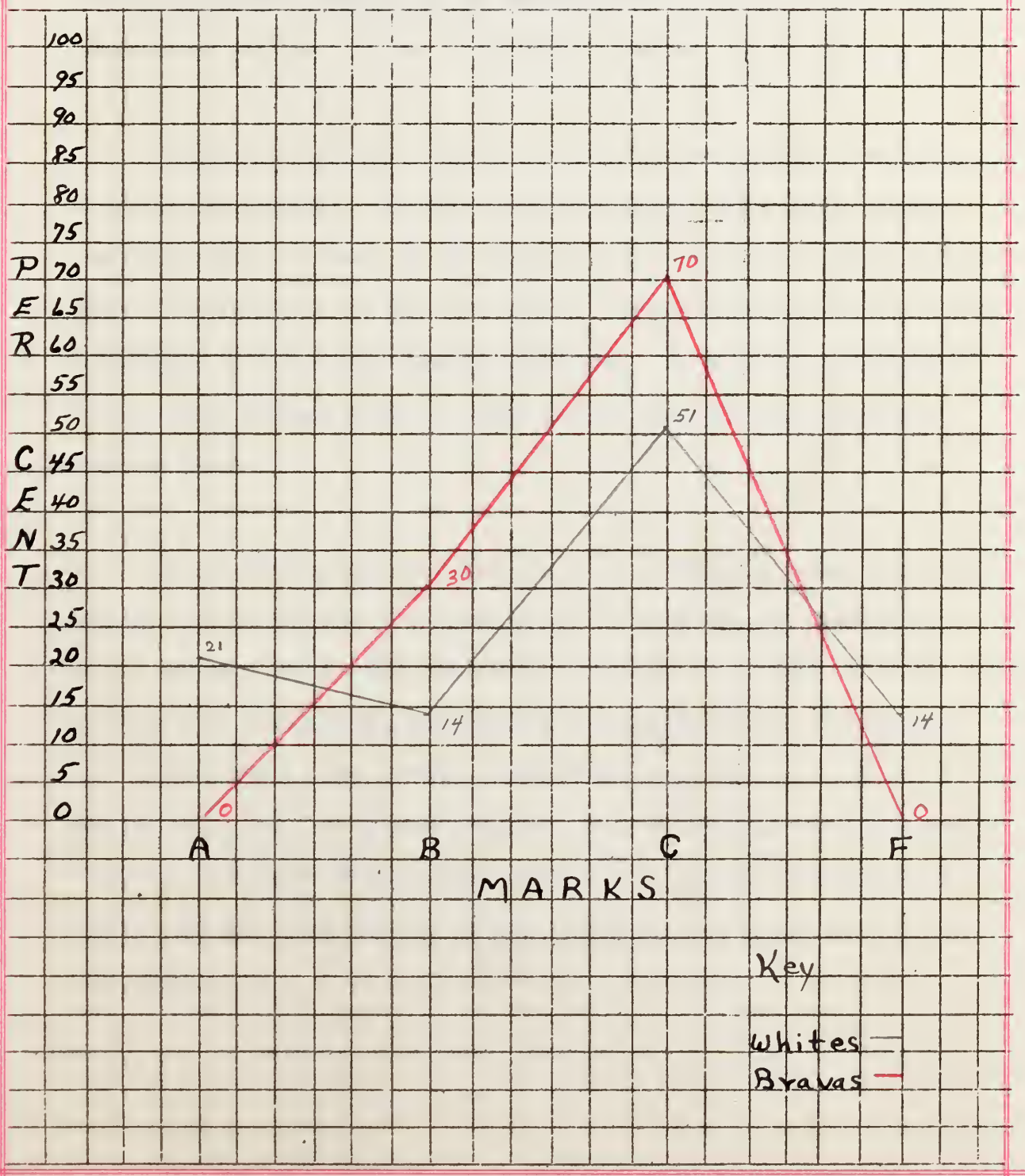
GRAPH 35

THE PER CENT OF A'S, B'S, C'S, AND F'S GIVEN TO THE WHITE AND BRAVA PUPILS IN ARITHMETIC IN GRADES 6 OF THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



GRAPH 36

THE PER CENT OF A'S, B'S, C'S, AND F'S GIVEN TO THE WHITE AND BRAVA PUPILS IN ARITHMETIC IN GRADE 9 OF THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



Graph 34 indicates that 24 % more Whites received B's, Whites 38 %--Bravas 14 %, and 25 % more Bravas received F's, Bravas 29 %--Whites 4 %. There are 25 % more Bravas in the C-F group, Bravas 86 %--Whites 61 %, while there are 24 % more Whites in the A-B group, Whites 38 %--Bravas 14 %.

Graph 35 indicates that 14.4 % of the Whites received A's but no Bravas. Twenty-one per cent (21%) more Bravas received B's, Bravas 40 %--Whites 19 %; however, only 6.6 % more Bravas were in the A-B group, Bravas 40 %--Whites 33.4%. Although 30 % of the Bravas received C's and 30 % failed, 6.6 % more Whites were in the C-F group, Whites 66.6 %--Bravas 60 %.

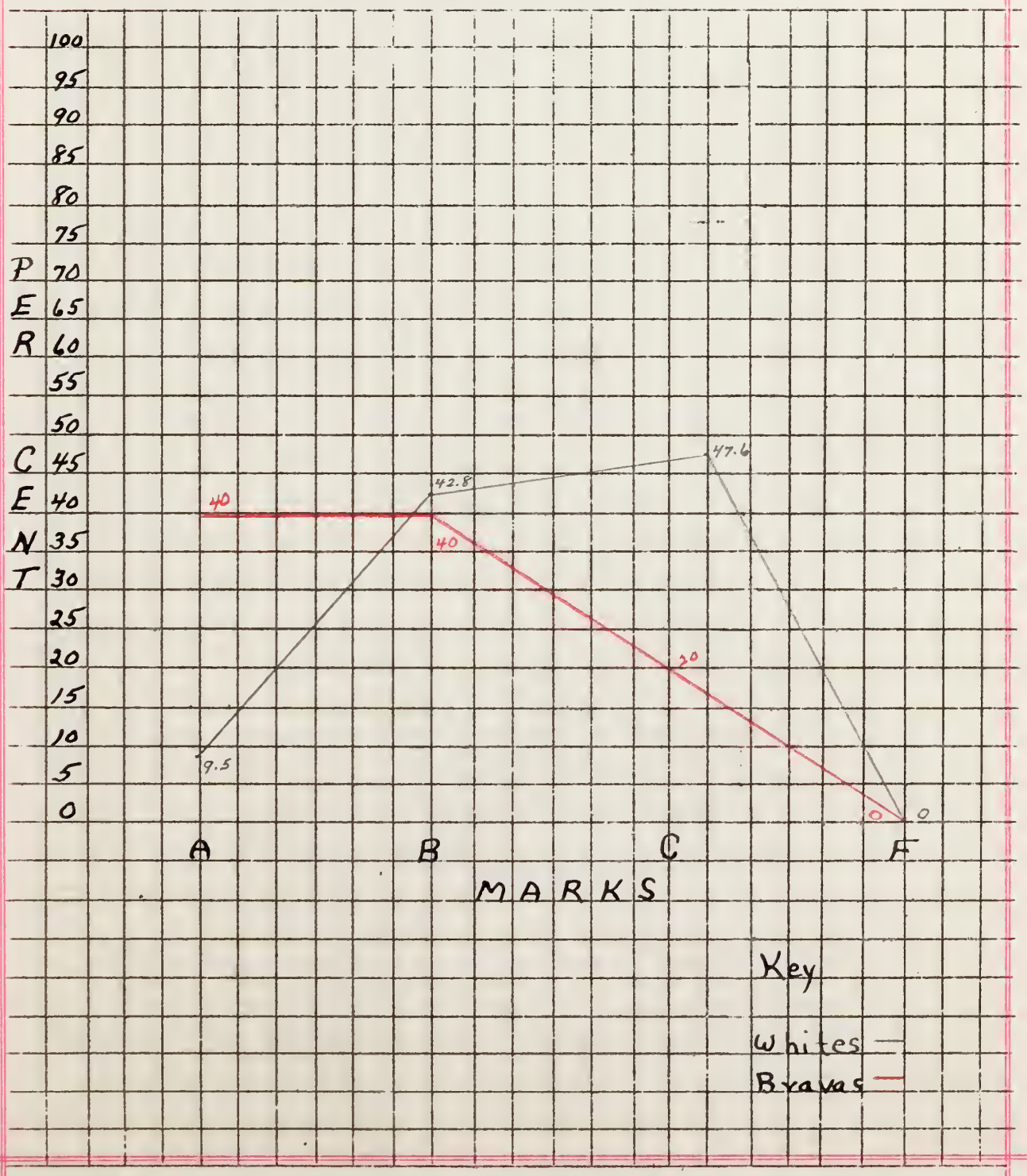
Graph 36 indicates that 21 % more Whites received A's, Whites 21 %--Bravas 0 %, while 16 % more Bravas received B's , Bravas 30 %--Whites 14 %; however, 5 % more Whites are in the A-B group, Whites 35 %--Bravas 30 %. Nineteen per cent (19%) more Bravas received C's, Bravas 70 %--Whites 51%, and 14 %, more Whites failed, Whites 14 %--Bravas 0 %, but 5 %, more Bravas are in the C-F group, Bravas 70 %--Whites 65 %. The entire Brava enrollment (100%) is in the B-C group.

A Summary On Arithmetic Marks.

As the Brava progresses from grades 3 to 9 respectively, the statistics as to the marks attained in Arithmetic indicate improvement. In no instance is there an indication of a Brava receiving an A. In grades 3, 29 % failed (F) while not a single member of the group attained a similar mark in grade 9. In the third grades, 71 % of the group were represented in the B-C bracket as compared to 70 % in grades 6 and 100 % in grade 9, an improvement of 29 % in 6 grades. Likewise, in grades3, 86 % of the group were represented in the C-F bracket as compared to 60 % in grades 6 and 70 % in grade 9, a decrease of 16 % in 6 grades.

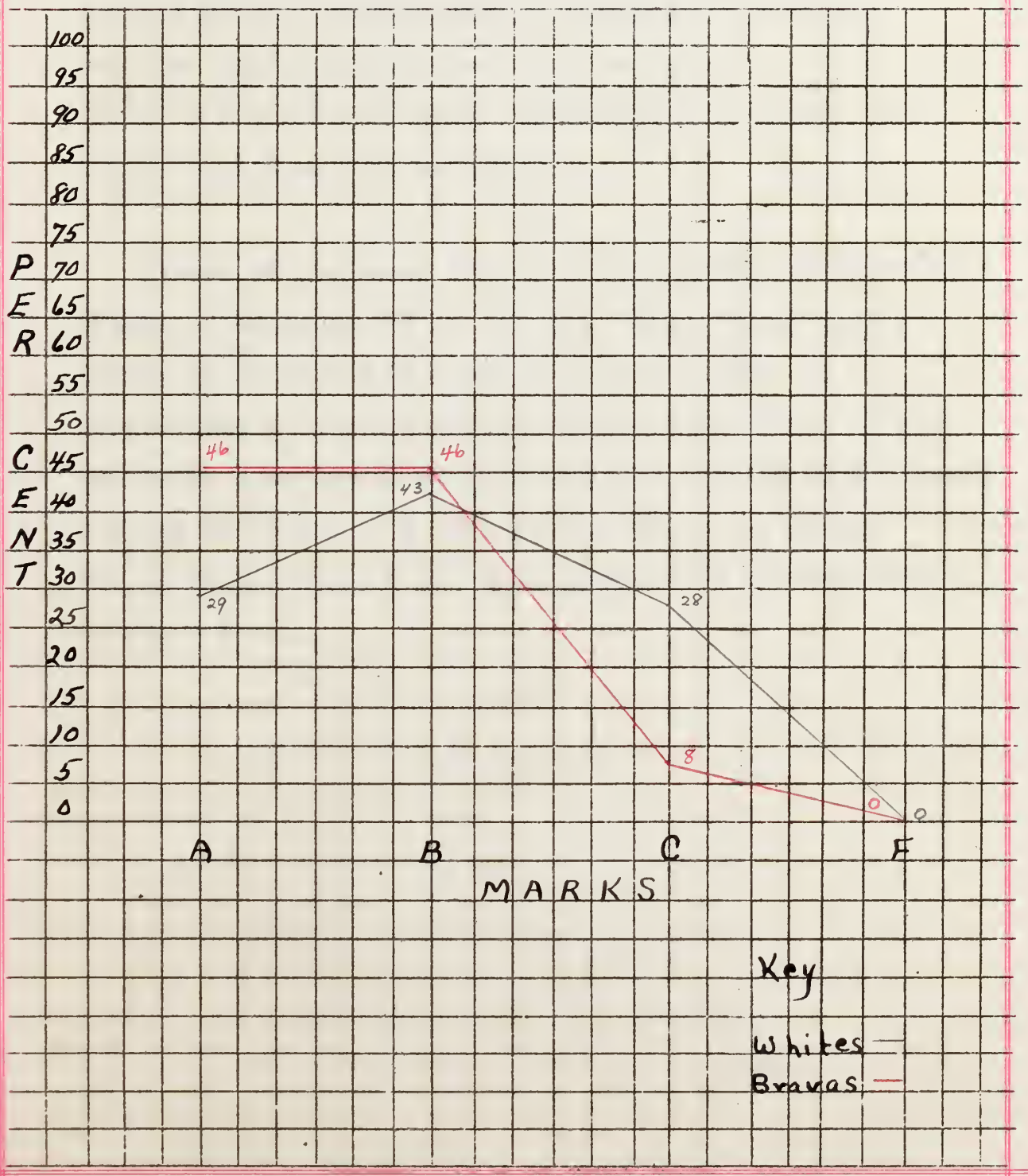
GRAPH 37

THE PER CENT OF A'S, B'S, C'S, AND F'S GIVEN TO THE WHITE AND BRAVA PUPILS IN ART IN GRADES 6 OF THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



GRAPH 38

THE PER CENT OF A'S, B'S, C'S, AND F'S GIVEN TO THE WHITE AND BRAVA PUPILS IN ART IN GRADE 9 OF THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



Graph 37 indicates that 52.3 % of the Whites received A's or B's while 80 % of the Bravas received the same marks. Only 20 % of the Bravas got C's as compared to 47.6% for the Whites. There were no failures. The Bravas received approximately four times as many A's, Bravas 40 %-Whites 9.5 %, and only about 2/5 as many C's, Bravas 20 %--Whites 47.6 %, as did the Whites.

Graph 38 indicates that 15 % more Bravas received A's, Bravas 46 %--Whites 29 %; 3 % more Bravas received B's, Bravas 46 %--Whites 43 %, and 20 % more Bravas are represented in the A-B group, Bravas 92 %--Whites 72 %. The White group received 20 % more C's, Whites 28 %--Bravas 8 %, and there are 20 % more Whites in the C-F group, Whites 28 %--Bravas 8 %. Both groups lack representation in the F group.

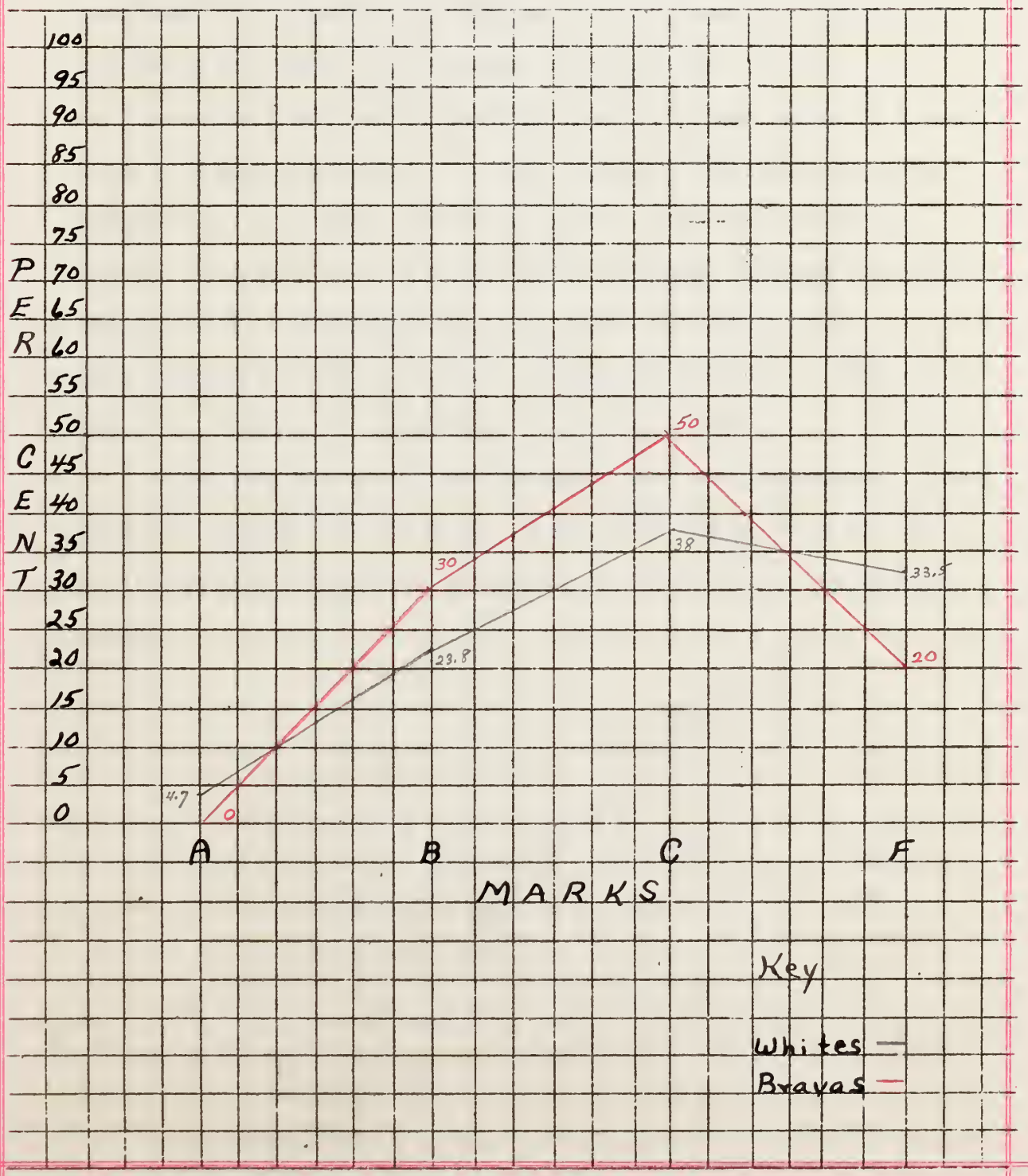
A Summary On Art And Handwork Marks.

Art and Handwork is the one phase of school work in which the Brava excels ; as he progresses, he gradually becomes more efficient. In neither grades 6 nor 9 is there evidence of Brava failure. In the sixth grades approximately 4 times as many Bravas as Whites received a mark of A, Bravas 40 %--Whites 9.5 %; a similar condition exists in grade 9, Bravas 46 %--Whites 29 %.

In grades 6, 20 % of the group received a mark of C as compared to 8 % in grade 9, an improvement of 11 % in 3 years. Eighty per cent (80) of the Brava group received either A's or B's in grade 6; 86 % were in a similar group in grade 9, indicating an improvement of 6 % in 3 years.

GRAPH 39

THE PER CENT OF A'S, B'S, C'S, AND F'S GIVEN TO THE WHITE AND BRAVA PUPILS IN GEOGRAPHY IN GRADES 6 OF THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.

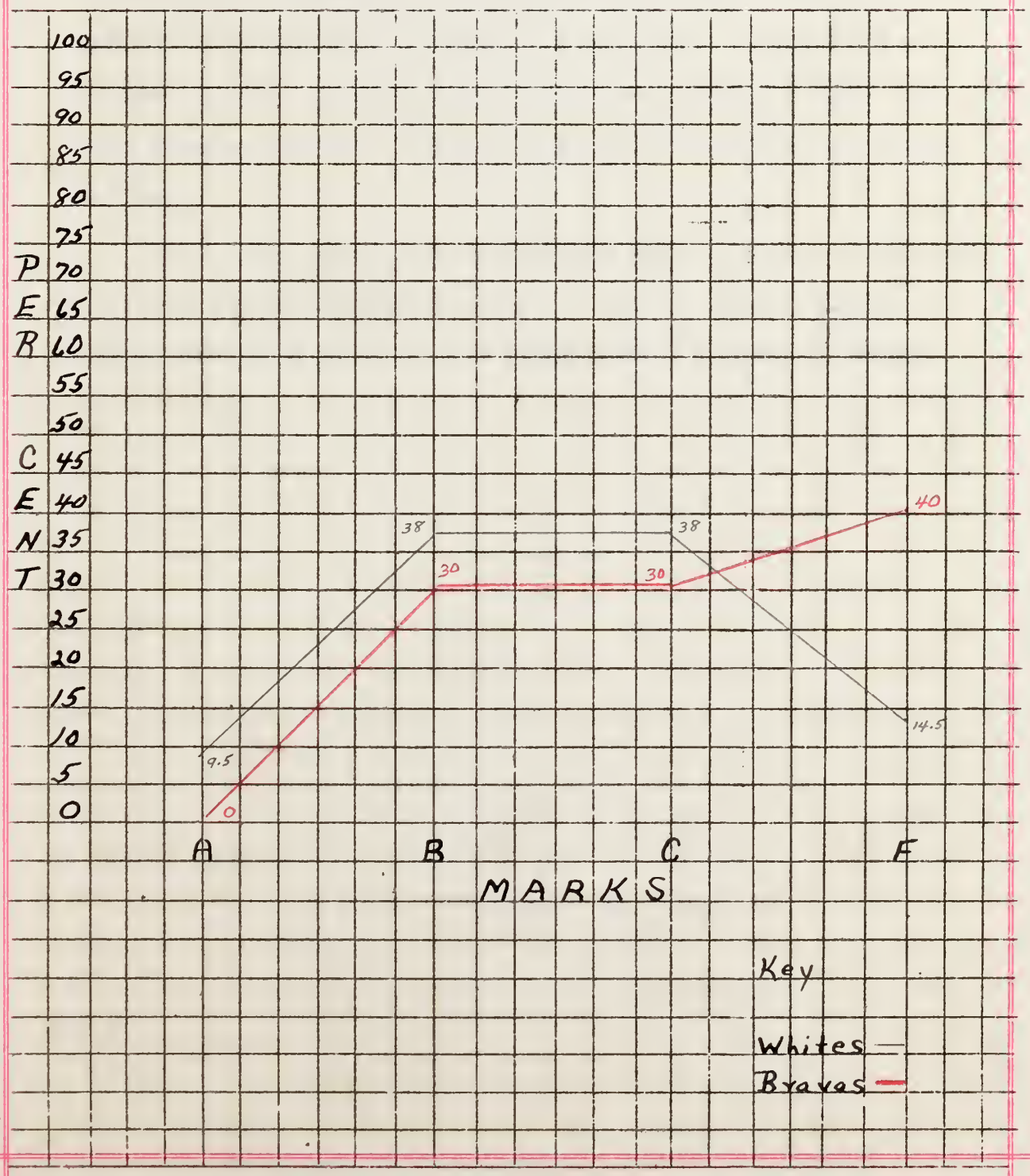


Graph 39 indicates that approximately the same per cent, 30 % and 28.5 % respectively, of A's and B's were acquired by both Bravas and Whites; however the Whites received 4.7 % more A's, Whites 4.7 %--Bravas 0 %, and the Bravas 6.2 % more B's, Bravas 30 %--Whites 23.8 %. It is well to note that approximately the same per cent, 70 % and 71.5 % respectively, of C's and F's were obtained by both groups but 12 % more Bravas received C's, Bravas 50 %--Whites 38 %, and 13.5 % more Whites failed, Whites 33.5 %--Bravas 20 %. Approximately the same per cent were represented in both the A-B, Bravas 30 %--Whites 28.5 %, and C-F, Bravas 70 %--Whites 71.5 %, groups.

Thus, the Brava can do average work in Geography; since 30 % or 3/10 got B's; 50 % or 1/2 got C's. Only 20 % or 1/5 of the Bravas failed as compared to 33.5 % for the White group.

GRAPH 40

THE PER CENT OF A'S, B'S, C'S, AND F'S GIVEN TO THE WHITE AND BRAVA PUPILS IN HISTORY IN GRADES 6 OF THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



Graph 40 indicates that the Whites received 9.5 % more A's, Whites 9.5 %--Bravas 0 %; 8 % more B's, Whites 38%-Bravas 30 %;and 8 % more C's, Whites 38 %--Bravas 30 %. The Whites received 17.5 % more A's and B's, Whites 47.5 %-Bravas 30 %,and 17.5 % fewer C's and F's, Bravas 70 %--Whites 52.5 %. Twenty-five and five-tenths per cent (25.5 %) more Bravas failed , Bravas 40 %--Whites 14.5 %, than did Whites.

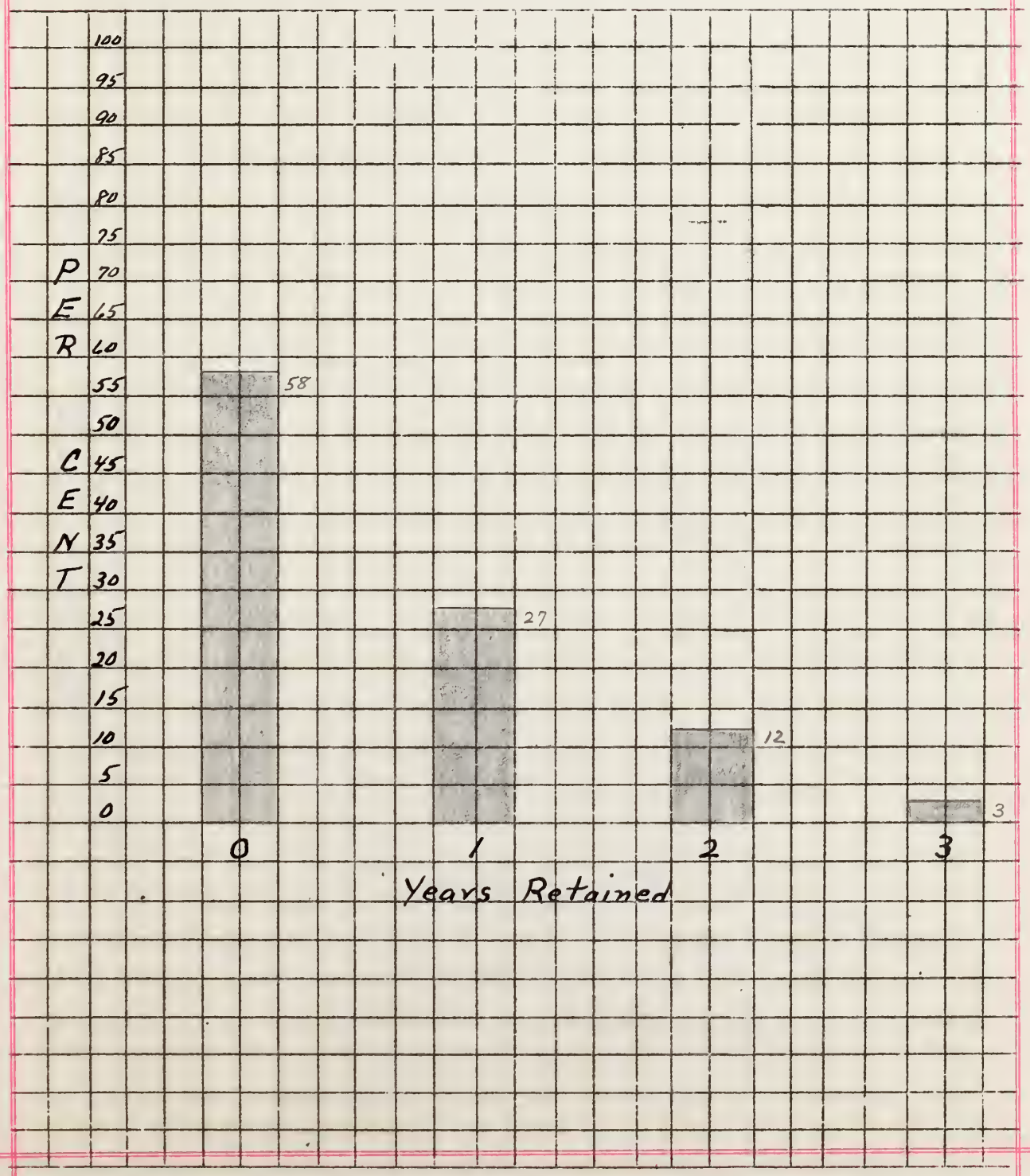
Thus, the Brava has difficulty with History, since not a single person received an A, 40 % or / of the group failed and 70 % or / of the group were in the C-F group.

CHAPTER VII

RETENTION IN GRADES 3 - 6 - 9.

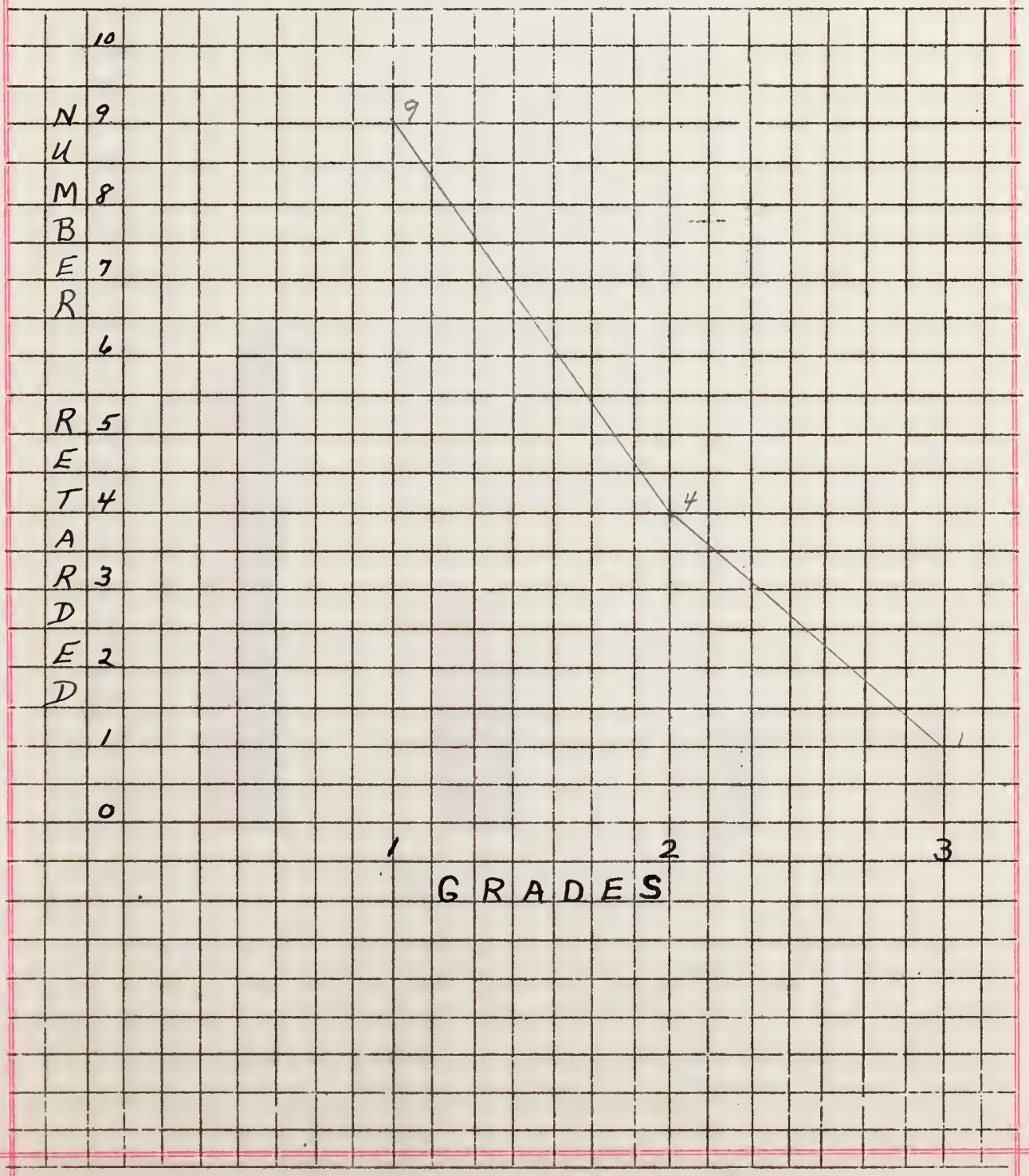
GRAPH 41

THE PERCENTAGE OF RETARDATION FOR THE TOTAL ENROLLMENT OF GRADES 3 IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



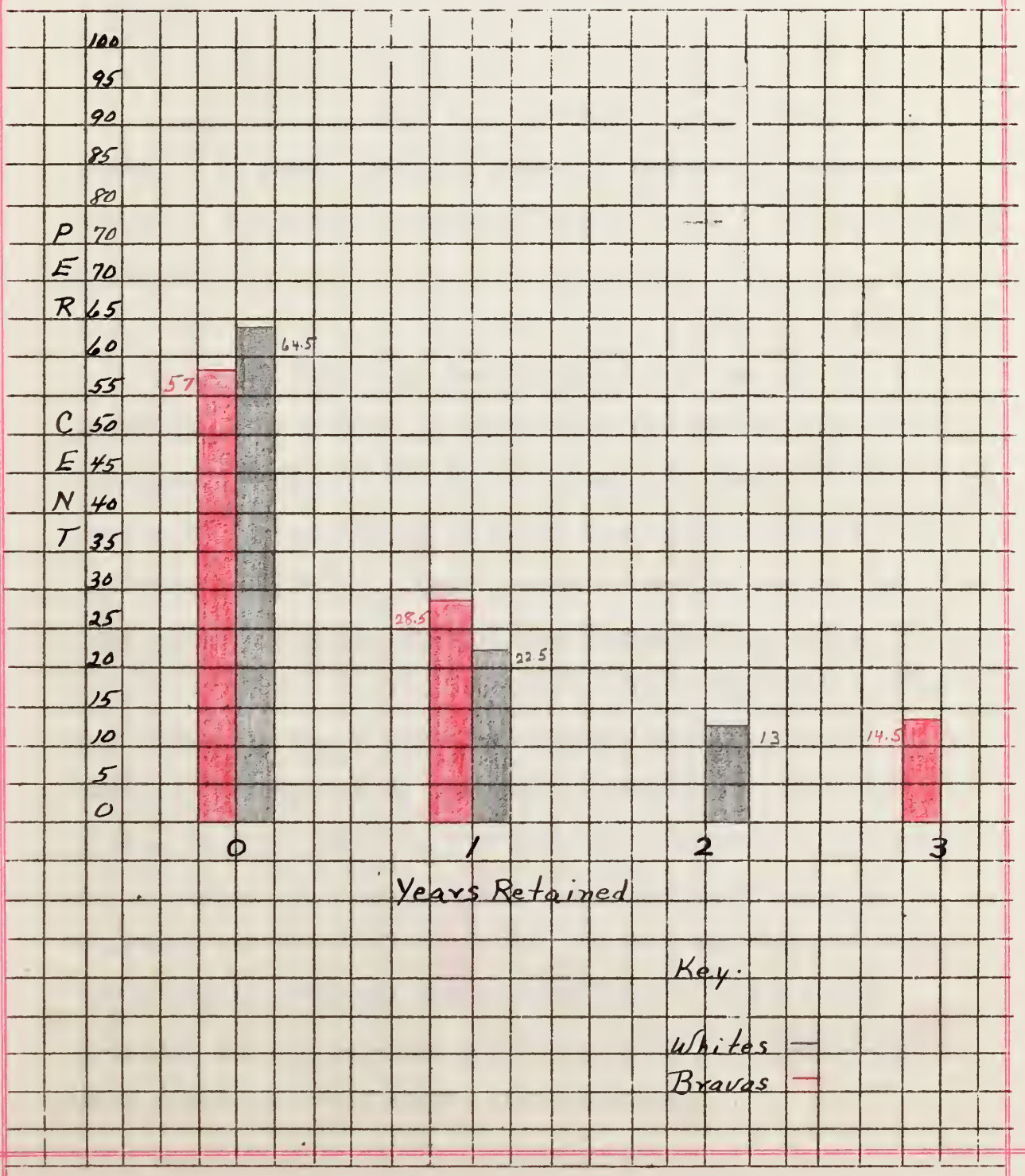
GRAPH 42

THE NUMBER OF RETARDATIONS AND THE SPECIFIC GRADES IN WHICH THEY OCCURRED FOR GRADES 3 IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



GRAPH 43

THE PER CENT OF RETARDATIONS FOR GRADES 3 IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



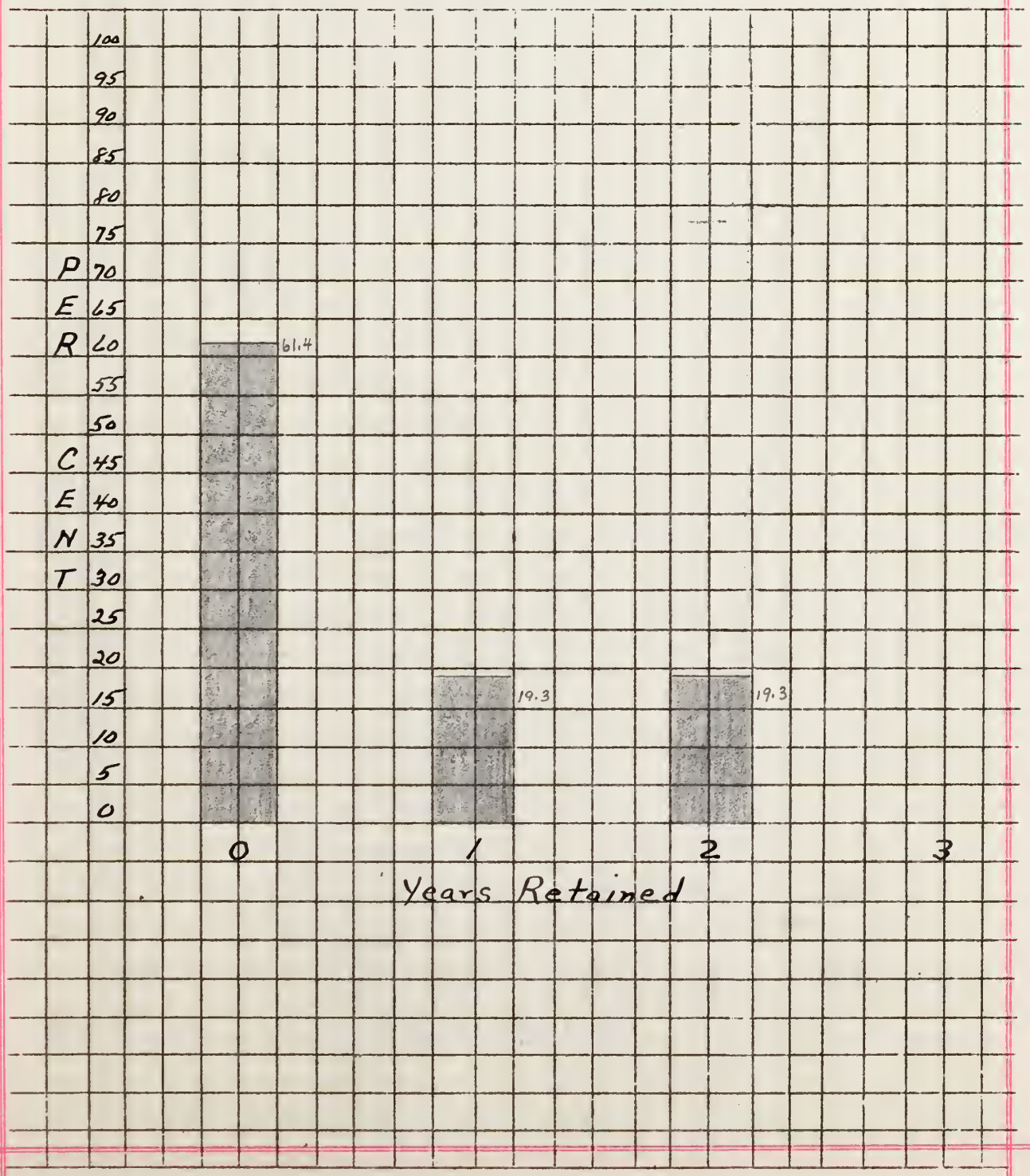
Graph 41 indicates that 58 % of the entire enrollment in grades 3 have never been retained in any grade but that 27 % of the group have failed to be promoted one year; 12 % have been retarded 2 years and 3 % have been retarded 3 years.

Graph 42 indicates that of those people completing grades 3 in June, 1940,the greatest number (9) repeated grade 1. Four people repeated grade 2 and 1 person repeated grade 3.

Graph 43 shows the percentages of White and Brava retentions for grades 3, 64.5 % of the Whites have not repeated a grade in the first 3 years of their school career as compared with 57 % for the Brava enrollment; a difference of 7.5 %. Twenty-eight and five-tenths per cent (28.5 %) of the Bravas have repeated 1 year as compared to 22.5 % for the Whites. These statistics point out that only 7.5 % more Whites than Bravas have not been retained in any one of the first 3 grades, Bravas 57 %--Whites 64.5 %. There is 6 % greater retention of the Brava for a period of 1 year, Bravas 28.5 %--Whites 22.5 %. Thirteen per cent (13 %) of the White group was retained for 2 years; no Brava was retained for 2 years only. Fourteen and five-tenths per cent (14.5%) of the Bravas were retained for 3 years, but no Whites.

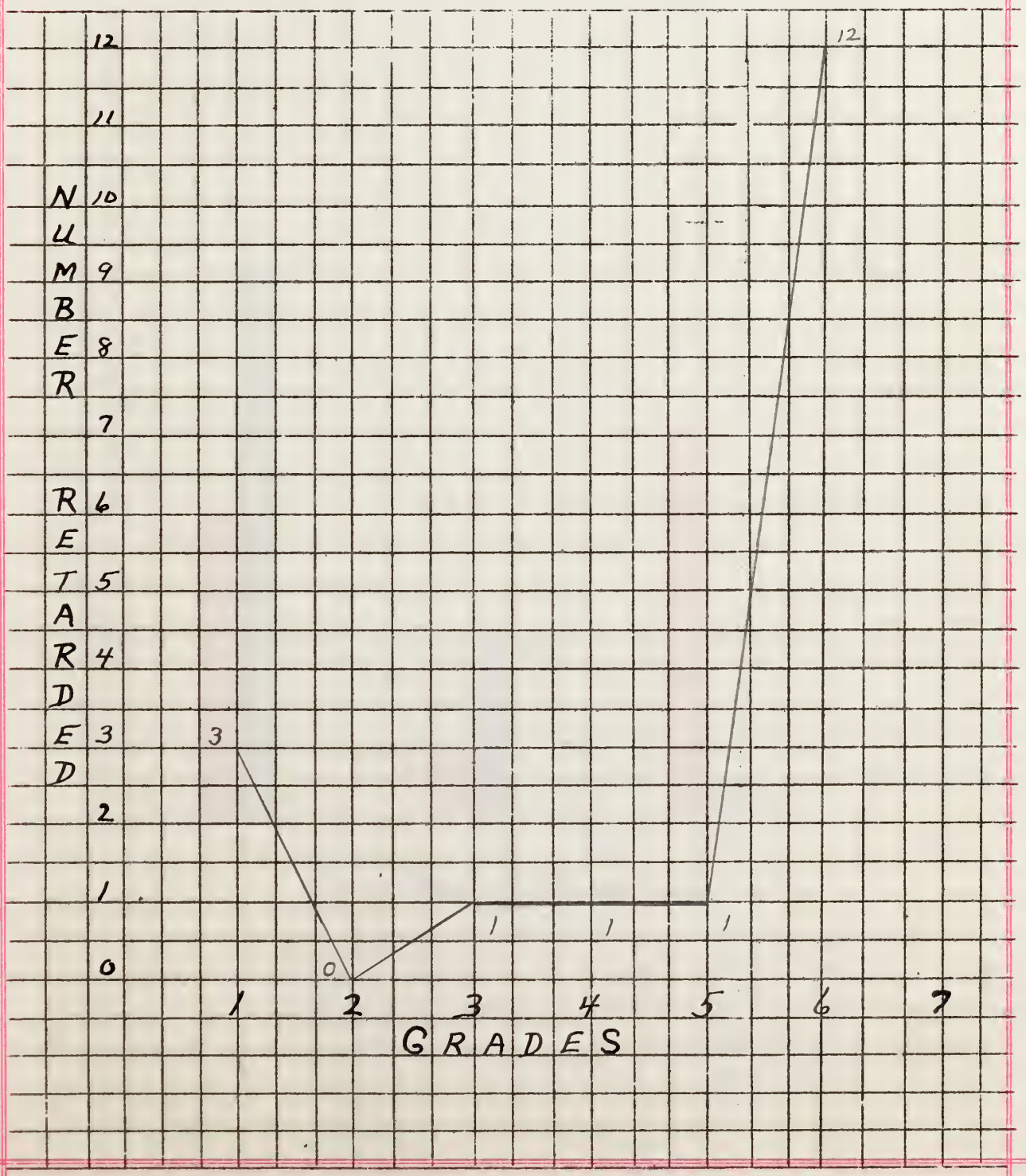
GRAPH 44

THE PERCENTAGE OF RETARDATION FOR THE TOTAL ENROLLMENT OF GRADES 6 IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



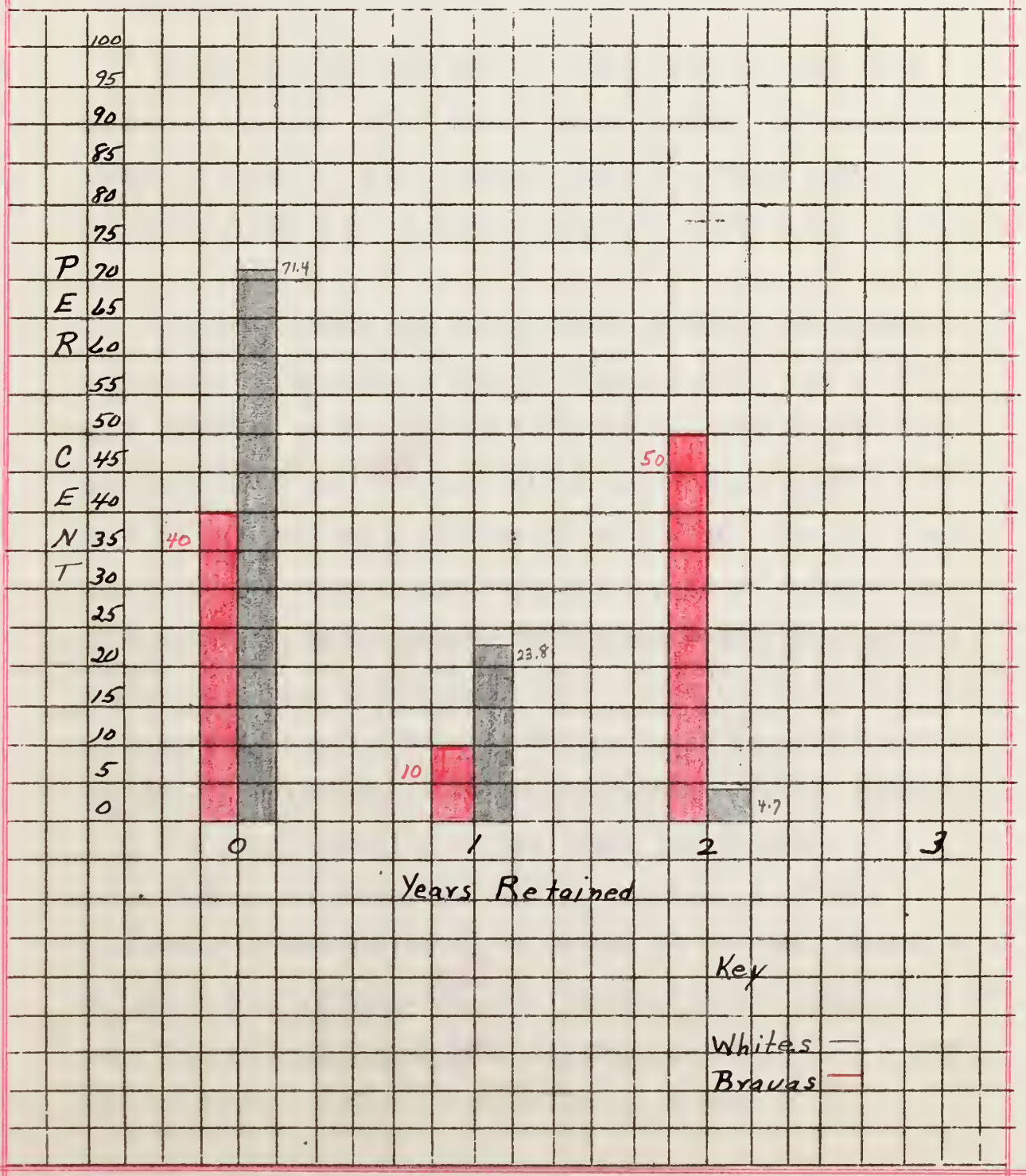
GRAPH 45

THE NUMBER OF RETARDATIONS AND THE SPECIFIC GRADES IN WHICH THEY OCCURRED FOR GRADES 6 IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



GRAPH 46

THE PER CENT OF RETARDATIONS FOR GRADES 6 IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



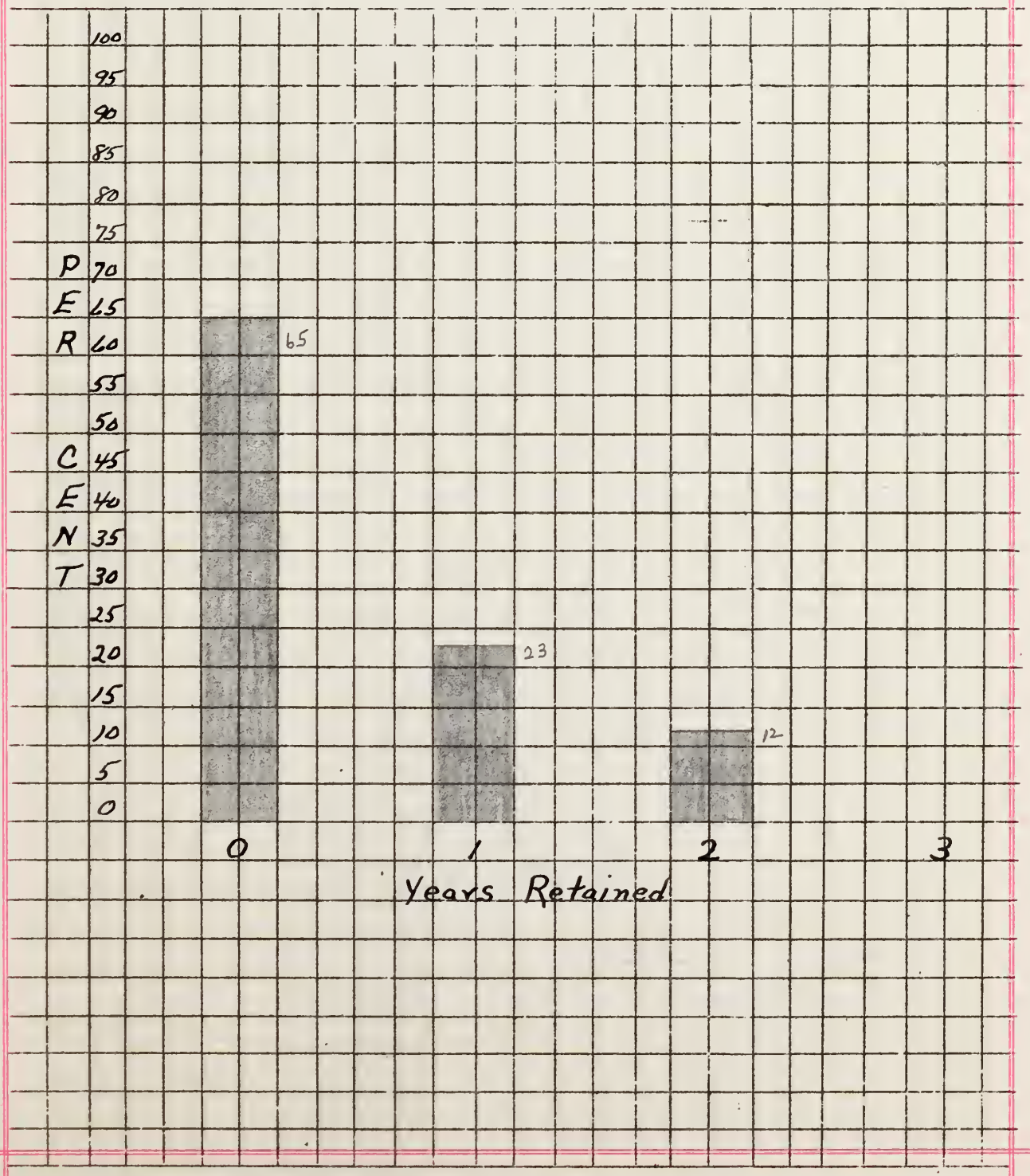
Graph 44 indicates that 61.4 % of the entire enrollment of grades 6 have never been retained in any grade but that 19.3 % of the group have failed to be promoted 1 year and that 19.3 % have been retarded 2 years.

Graph 45 indicates that of those pupils completing grades 6 in June, 1940, the greatest number (12) repeated grade 6, while no one repeated grade 2. Three people repeated grade 1 and 1 person repeated grade 4 and 1, grade 5.

Graph 46 shows the percentages of White and Brava retention for grades 6. Seventy-one and four-tenths per cent (71.4 %) of the Whites have not repeated a grade in the first 6 years of their school career as compared with 40 % of the Bravas, a difference of 31.4 %. Ten per cent (10 %) of the Bravas have repeated 1 year as compared to 23.8 % for the White group. Fifty per cent (50 %) of the Bravas have been retained 2 years during the first 6 grades as compared to 4.7 % for the Whites; that is, approximately 10 times more Bravas have been retained 2 years. There is a 13.8 % less retention of the Brava for a period of 1 year, Bravas 10 %--Whites 23.8 %; but 45.3 % greater retention of the Bravas for a period of 2 years, Bravas 50 %-Whites 4.7 %. Thirty-one and four-tenths per cent (31.4 %) more Whites than Bravas have not been retained in any one of the first 6 grades, Whites 71.4 %--Bravas 40 %.

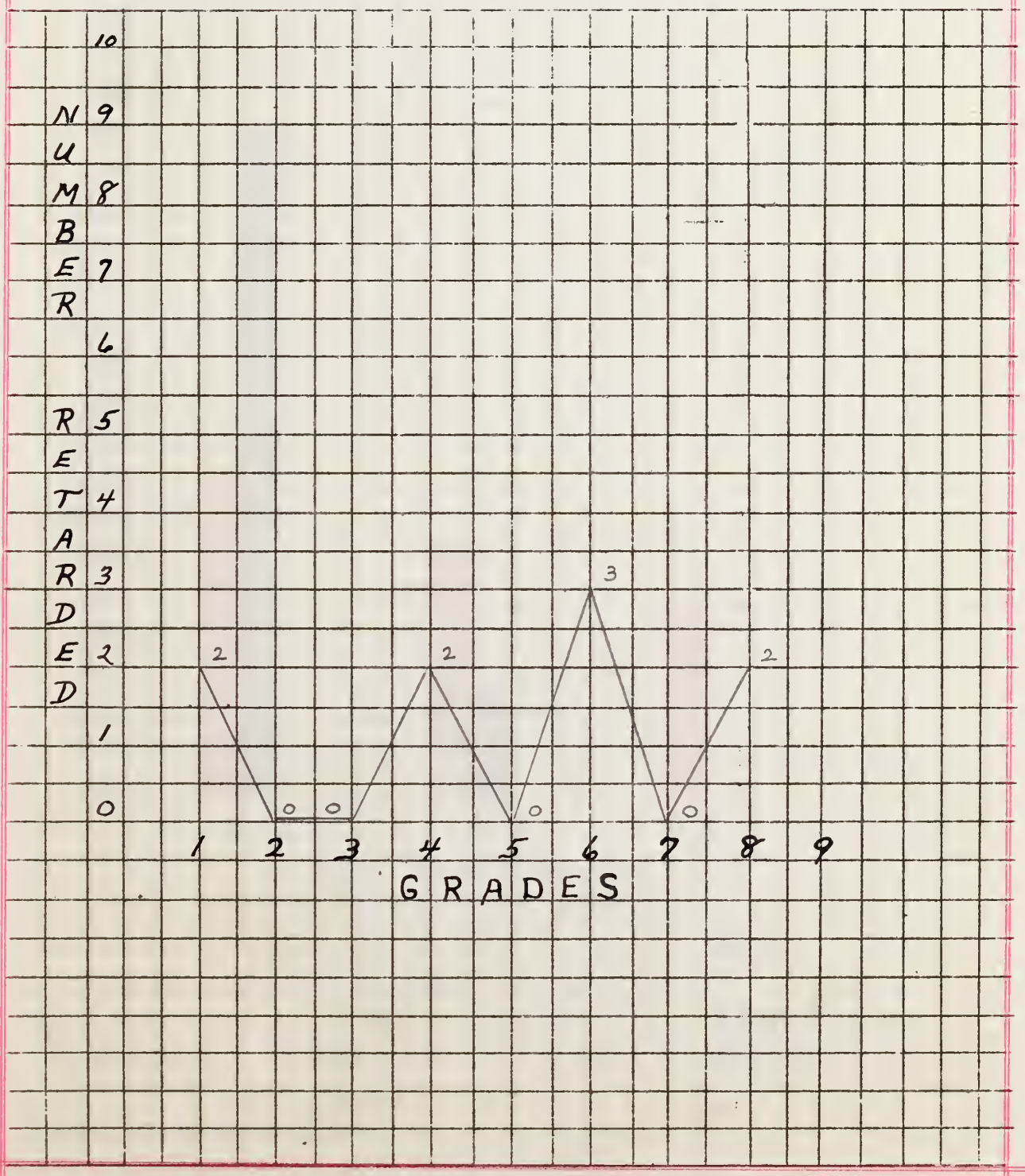
GRAPH 47

THE PERCENTAGE OF RETARDATION FOR THE TOTAL ENROLLMENT OF GRADE 9 IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



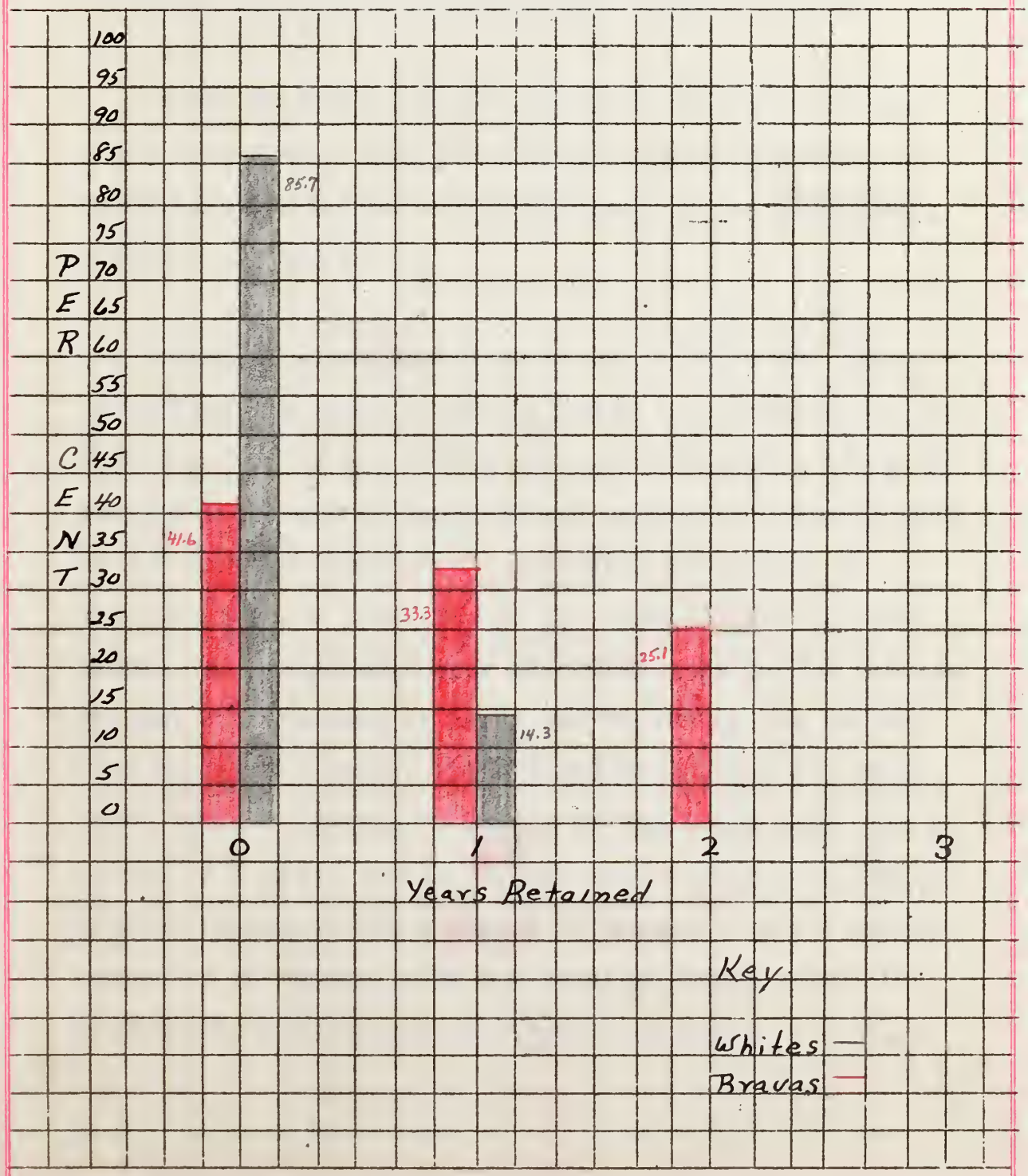
GRAPH 48

THE NUMBER OF RETARDATIONS AND THE SPECIFIC GRADES IN WHICH THEY OCCURRED FOR GRADE 9 IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



GRAPH 49

THE PER CENT OF RETARDATIONS FOR GRADE 9 IN THE PUBLIC SCHOOLS OF MARION, MASSACHUSETTS 1940.



Graph 47 indicates that 65 % of the entire enrollment of grade 9 have never been retained in any grade but that 23 % of the group have failed to be promoted 1 year and 12 % have been retarded 2 years.

Graph 48 indicates that of those people completing grade 9 in June, 1940, the greatest number (3) repeated grade 6, while 2 people repeated each of the following grades, 1, 4 and 8.

Graph 49 shows the percentages of White and Brava retentions for grade 9. Eighty-five and seven-tenths per cent (85.7 %) of the Whites have not repeated a grade in the first 9 years of their school career as compared with 41.6 % for the Brava group, a difference of 44.1 %. Thirty-three and three-tenths per cent (33.3 %) of the Bravas have repeated 1 year as compared to 14.3 % for the Whites, a difference of 19 %, and 25.1 % of the Bravas have repeated 2 years. These statistics point out that there is 19 % greater retention of the Brava group for a period of 1 year, Bravas 33.3 %--Whites 14.3 %, and 25.1 % greater retention for a period of 2 years. Not a single member of the White group was retained for 2 years but 14.3 % of the group was retained for 1 year.

CHAPTER VIII

SUMMARY AND CONCLUSIONS.

Over a period of 11 years, 1930--1940, the Brava enrollment has increased gradually, from 63 in 1930 to 121 in 1940. During this period the per cent of Bravas has almost doubled; in 1930 the Brava enrollment was only 25 % of the total membership whereas in 1940 it had risen to 42 % of the total enrollment, thus gradually approaching half the school population.

The average membership for the Bravas in grades 1 from 1930--1940 was 19.8; while the average membership for grade 9 was 2.9, a difference of 16.9 or 85.3 %. The average White membership for grades 1 for the same period was 24.1, while the average membership for grade 9 was 15.5, a difference of 8.6 or only 35.6 %. The average White decrease in enrollment between grades 1 and 9 for the 11 years has been 8.6 or 35.6 % as compared to the average Brava decrease of 16.9 or 85.3 %, a difference of 49.7 %. This indicates that approximately 50 % more Whites than Bravas attain the ninth grade.

The average percentage of failures for the Brava from 1930--1940 was 16 % as compared to an average of 8.7 % for the Whites, almost twice as many failures among the Bravas as among the Whites.

The greatest Brava retention takes place in grade 1, 2, 3 and 4; there is little or no Brava retention in grades 7--8. This is due to the fact that few Bravas continue in school beyond grade 6; that is, if they have reached their 16th birthday and have completed the 6th grade, they leave school since this is permitted by the Massachusetts State Laws. There is marked increase in the number of Whites retained in grades 6--7.

In grades 1 the White I Q's are 6.7 scores greater (Whites 95--Bravas 88.3) than the Bravas: 92.1 % of the Whites equal or exceed the average I Q of the Brava, 83.13, while not a single member of the Brava group attains the White mean of 101.25.

In grades 2 the White I Q's are 22.8 scores greater (Whites 105.0--Bravas 82.2) than the Bravas; 83.2 % of the Whites equal or exceed the average I Q of the Brava, 80.60, while not a single member of the Brava group attains the White mean of 101.85.

In grades 3 the White I Q's are 13.12 scores greater (White 88.12--Bravas 75.0) than the Bravas; 90.6 % of the Whites equal or exceed the average I Q of the Brava, 79.00, while only 10 % of the Brava group attain the White mean of 91.45.

In grades 4 the White I Q's are 20 scores greater (Whites 95.0--Bravas 75.0) than those of the Bravas;

89.4 % of the Whites equal or exceed the average I Q of the Brava, 74.50, while only 5 % of the Brava group attain the White mean of 96.81.

In grades 5 the White I Q's are 12.0 scores greater (White 87.50--Bravas 75.50) than the Bravas; 82.5 % of the Whites equal or exceed the average I Q of the Brava, 78.30, while only 29.4 % of the Brava group attain the White mean of 85.33.

In grades 6 the White I Q's are 27.5 scores greater (Whites 102.50--Bravas 75.0) than the Bravas; 97.2 % of the Whites equal or exceed the average I Q of the Brava, 72.30, while not a single member of the Brava group attains the White mean of 99.71.

In grade 7 the White I Q's are 32.0 scores greater (White 97.0--Bravas 65.0) than the Brava; 98.1 % of the Whites equal or exceed the average I Q of the Brava, 70.00, while not a single member of the Brava group attains the White mean of 94.05.

In grade 8 the White I Q's are 20.0 scores greater (Whites 95.0--Bravas 75.0) than the Bravas; 80.8 % of the Whites equal or exceed the average I Q of the Brava, 80.00, while only 33.3 % of the Brava group attain the White mean of 96.6 .

In grade 9 the White I Q's are 18.3 scores greater (White 93.3--Bravas 75.0)than the Bravas; 90 % of the Whites equal or exceed the average I Q of the Brava, 76.25,

while only 12.5 % of the Brava group attain the White mean of 91.70.

To summarize, the average I Q of the total White enrollment exceeds the I Q of the total Brava enrollment by 18.2 scores (White 95.5--Bravas 77.3); 96 % of the Whites equal or exceed the average I Q of the Brava,74.18, while but 12.6 % of the entire Brava enrollment attain or exceed the average White mean of 95.4.

The Brava group shows constant gradual improvement in Arithmetic Computation always being above the national median, but the White group on the whole shows an improvement of 5 more equated scores than do the Bravas. Again the Brava group shows constant improvement in Arithmetic Reasoning but the achievement of the White group is 4 times that of the Brava; that is,in grades 2 there is a difference of 3 scores as compared to a difference of 12 scores in grade 9. The equated score of the White group is constantly greater than the national median, but the Brava scores are never more than 2 equated scores above and as many as 4 scores below the national median. In Reading, the achievement of the White group is 2.5 times greater than that of the Brava; that is, in grades 2 there is a difference of 8 scores as compared to a difference of 20 scores in grade 9. The Brava shows constant but slow progress. The White group is always at least 5 equated scores above the national median while the Brava group does not exceed the

national median after the completion of the 4th grade and in grade 6 is 7 equated scores below the national median. The White achievement in Language Usage is 2.5 times greater than the achievement of the Brava group; that is, in grades 4 there is a difference of 10 scores as compared to a difference of 25 scores in grade 9. The White group is constantly above the national median, never being fewer than 9 equated scores above while the Brava group is never more than 1 above and as many as 8 equated scores below the national median. The White achievement in Literature is 1.9 times greater than the achievement of the Brava group; that is, in grades 4 there is a difference of 11 scores as compared to a difference of 21 scores in grade 9. The White group is constantly above the national median, never fewer than 5 equated scores above, while the Brava group is never more than 1 equated score above and as many as 13 scores below in grade 6. In Spelling, the White group shows far more improvement (26 scores) in 5 grades than does the Brava group. In grades 4 the White group's score was 41 as compared to a Brava score of 50; but in grade 9 the White group attained a score of 83, while the Brava score was 66. In other words, the White group improved 42 scores and the Brava group improved 16 scores, a difference of 26 scores. The White group is never fewer than 2 equated scores above the national median, while the Brava group goes from 16 equated scores

above the national median (grades 4) to 2 scores below (grade 9). In the Social Studies both groups are above the national median in grades 4 (Bravas 5 scores--Whites 5 scores) but in grade 9 the White group is 7 equated scores above the national median while the Brava group is 12 scores below; that is, the White group improves 19 times more than does the Brava in 5 grades. The White children make their greatest progress in grades 7-8-9 while the Bravas make little or no progress but improve the most in grades 5 and 6 and reach a plateau in grades 7,8 and 9. The White group shows gradual improvement in Elementary Science and is constantly above the national median never being fewer than 4 equated scores above. The Brava group is below the national median except in grade 4 when they are 8 scores above the national median. The average equated score for all the Bravas of grades 3 is 22, 16 equated scores below normal, as compared to the average equated score of all the Whites, 30, 8 scores below the standard for the grade. Thus, the average equated score of the Brava is twice as far below the standard average equated score as is the average equated score of the White. The average equated score for all the Brava members of grades 6 is 39, 39 equated scores below normal, as compared to the average equated score established by the White members of the grade, 63, which is 15 scores below the standard for the grade. In other words, the average equated score as established

by the Brava group is 2.6 times farther below the standard average equated score. The average equated score for all the Brava members of grade 9 is 61, 37 equated scores below normal, as compared to the average equated score established by all the White members of the grade,75, which is 23 scores below the standard for the grade. In other words, the average equated score as established by the Brava group is 1.6 times farther below the standard average equated score.

An analysis of the Reading marks indicate that the Brava has difficulty in mastering the subject. In grades 3, 14 % failed as compared to 20 % in grades 6; 6 % more failed in grades 6 than failed in grades 3. In the third grades, 43 % got C's while in grades 6, 40 % attained the same mark. Forty-three per cent (43 %) got B's in grades 3 as compared to 30 % in grades 6, while 10 % of the Brava group received A's in grades 6. No one in either the White or the Brava group received the mark of A in grades 3. In grades 3, 10 % more Bravas failed than did Whites, Bravas 14 %--Whites 4 %, while in grades 6, 15.1 % more Bravas received a similar mark, Bravas 20 %--Whites 4.9 %, than did the White group.

Spelling is a strong subject for the Brava group. In grades 3, 14 % received a mark of C but in both grades 6 and 9 the lowest mark attained was a B. The number of A's received further supports the above statement: in

grades 3, 43 %; grades 6, 70 % and in grade 9, 62 %. In grade 9 there is 100 % Brava representation in the A-B group as compared to only 86 % in grades 3, an improvement of 14 % in 6 grades. Likewise, in grade 9 the Brava group lacks representation in the C-F group as compared to 14 % in grades 3, a decrease of 14 % in 6 grades.

An analysis of the English marks indicates a slight improvement (10%) in the mastery of English by the Brava group in grades 6 and 9 respectively. In grades 6, 10 % failed or received a mark of F, while in grade 9 no one received a mark lower than C. Thirty per cent (30 %) of the Bravas received B's in grades 6 as compared to 46 % in grade 9 but 6 % more received C's in grades 6 (60%) than in grade 9 (54 %). In grade 9 there is 10 % greater representation (100%) in the B-C group than in grades 6 (90%). There is 16 % greater Brava representation in the C-F group in grades 6 (70 %) than there is in grade 9 (54%).

As the Brava progresses from grades 3 to 9 respectively, the statistics as to the marks attained in Arithmetic indicate improvement. In no instance is there an indication of a Brava receiving an A. In grades 3, 29 % failed (F) while not a single member of the group attained a similar mark in grade 9. In the third grades, 71 % of the group were represented in the B-C bracket as compared to 70 % in grades 6 and 100 % in grade 9, an improvement of 29 % in 6 grades. Likewise, in grades 3, 86 % of the group

were represented in the C-F bracket as compared to 60 % in grades 6 and 70 % in grade 9, a decrease of 16 % in 6 grades.

Art and Handwork is one phase of the school work in which the Brava excels; as he progresses, he gradually becomes more efficient. In neither grades 6 nor 9 is there evidence of Brava failure. In the sixth grades approximately 4 times as many Bravas as Whites received a mark of A, Bravas 40 %--Whites 9.5 %; a similar condition exists in grade 9, Bravas 46 %--Whites 29 %. In grades 6, 20 % of the group received a mark of C as compared to 8 % in grade 9, an improvement of 11 % in 3 years. Eighty per cent (80%) of the Brava group received either A's or B's in grade 6; 86 % were in a similar group in grade 9, indicating an improvement of 6 % in 3 years.

An analysis of the Social Studies marks indicate that the Brava has difficulty in mastering the subjects. In Geography, 30 % or $\frac{3}{10}$ got B's; 50 % or $\frac{1}{2}$ got C's and 20 % or $\frac{1}{5}$ of the Bravas failed. In History, not a single member of the group received an A, 40 % or $\frac{2}{5}$ failed (F) and 70 % or $\frac{7}{10}$ were in the C-F group.

CHAPTER IX

RECOMMENDATIONS.

Approximately 75 % of the Brava students who enter school never reach the ninth grade; more than 40 % of those who begin the first grade leave school by the time the seventh grade has been completed. Of those who graduate only a very few, approximately 15 %, continue in higher schools of learning. Therefore, most of the time spent in grades 7-8 and 9 is spent in preparing for a future education which is never considered by the Brava group.

The large percentage of students leave school for many reasons, including failure in school work, poor health, lack of correlation between school work and socially chosen occupations and lack of interest. In order to assist in the solution of the Brava problems as mentioned above, schools should broaden the exploratory opportunities for students and improve their guidance programs to give a wider base for intelligent selection and a better preparation for effective participation in future life situations.

The Brava has definite social needs and requirements. The following reasons may be considered as a basis for the widespread concern about the Brava problem as it exists at the present in the schools of Marion, Massachusetts:

1. The increased Brava enrollments have brought into

the schools large numbers of students of relatively low ability whose best interests do not seem to be served by the old academic curriculum.

2. The average I Q of the Brava members of the school population is 77.

3. The preparation of students for high school can no longer be recognized as the primary objective, since only 15 % of the Brava pupils go beyond the ninth grade.

4. There is a growing demand that the schools increase the emphasis on preparation for the making of a living and on training for more effective adjustment to adolescent and adult responsibilities.

5. The increased difficulties encountered by the youth in securing employment have caused many parents to express a desire for a more intensive vocational program.

Since we are primarily concerned with the educational problems of the Brava, these suggestions and recommendations are made in his behalf:

1. Possibly the situation might be improved by the introduction of a pre-primary class. If such a class were introduced, the mental age at entrance might be brought nearer to six. Since it has been quite definitely determined by experiment that a child cannot learn to read until he is six years old mentally, it follows that the nearer the child is to that mental age the more satisfactory the results are likely to be. The environmental

home conditions of the Brava are such that under existing circumstances he lacks even the simplest basic ideas known to even the lowest White child.

2. Homogeneous grouping has its possibilities; it is not synonymous with ability grouping but is reduced heterogeneity or refined classification. It is a democratic form of classification based on interests, aims or needs and serves best those pupils decidedly below average in their ability to do the work of the grade.

3. Special classes would be of great assistance since they begin where homogeneous grouping leaves off. The instruction is largely individual. These classes are for the mentally inferior, not for those who are below grade because of absence, physical condition or for any other reason except inferior mentality. The purposes of the special class instruction for these pupils are:

a. To give each pupil as much of the standard curriculum as he can take with reasonable effort.

b. To give more work of a manual nature than he can be given in regular classes.

c. To discover and to train any special ability the child may show which would enable him to become a useful member of society.

d. To instill proper attitudes towards problems of citizenship and towards life in general.

4. Modified methods in connection with the regular grade work of those pupils not in the special classes offer possibilities for those needs of the inferior Brava which cannot be met merely by electives or by reducing the number of subjects carried.

The school personnel might:

a. Emphasize the applied aspects of their subjects.

b. Substitute natural situations for formal class room procedures.

c. Utilize that subject matter which can be usable in one's future undertakings.

d. Recognize to a greater extent the educational values of actual work by pupils.

e. Offer more complete programs of training in health habits and social adjustment.

f. Depend less on the single text book and emphasize more field trips, projects and community undertakings.

g. Utilize personal experiences as a basis for motivation.

h. Emphasize more in English courses the services such courses might render to other courses or to real life situations.

i. Emphasize more the recreational phases of physical educational.

5. The old general cultural courses should be revised to include new materials. The following suggestions have

possibilities:

a. More practical arithmetic and less algebra.

b. More hygiene and less anatomy.

c. More ethics and less theology.

d. More constitutional law and less Roman.

e. Increased emphasis on music, especially instrumental music since it gives opportunity for both individual and group activity.

f. Increased emphasis on certain phases of the social studies, especially those relating to community problems, civics and state and local government.

g. More courses in consumer education.

h. More exploratory courses in household science and art.

i. Having as part of the regular school work certain activities now regarded as extra-curricula.

j. Offering one or more courses in leisure reading according to student interests.

k. Increased emphasis on vocational and industrial courses of an exploratory nature.

6. Some form of vocational and educational guidance should be introduced to enlighten the Brava as to how his school work will fit him for the work that he will do in later life. The school should then train him along those lines for which he is best fitted. Since so few of the Bravas go on to high school probably the greater number

should not be taught the regular college preparatory work but should be given work in such courses as practical manual training or domestic arts.

7. The foregoing suggestions have been made in behalf of those Bravas who constitute the school population at the present time; but since the primary obligation of the school is to provide a program for every citizen, some form of adult education should be inaugurated. It should train the individual in civic, social and political responsibilities, imbue him with the idea and ideals of moral worth, make it possible for him to adjust himself socially and economically and make him both willing and able to contribute his best to society in each of these fields. An adult educational program could well meet the needs and desires of the Brava population of Marion, Massachusetts, since the parents of the Brava are either poorly educated or illiterate. Keeping in mind the fact that although the Brava has difficulty in academic subjects, he does possess potential possibilities in the tool and mechanical subjects, it would seem that a special adult program has possibilities. General instruction could be offered in Americanization classes, which could include the social, political and moral aspects of community affairs for an adult mixed group. Special instruction could be offered for women and girls in home nursing and hygiene, sewing, dressmaking and cooking as well as in any other subjects in which a

majority showed an interest. Vocational courses could be offered for the men and boys in agriculture, wood working, electricity, plumbing and possibly general auto mechanics. Instructors for these courses need not be regular trained teachers but could be local talented trades-men and the facilities as they now exist would furnish a means for a beginning. It is understood that such a program costs money and that the present trend is to limit the school budget to mere necessities. The following is a brief summary of public welfare for the years 1935 and 1940 in the town of Marion, Massachusetts:

Public Welfare ---1935

a. Number of Brava cases---55.

b. Number of persons represented---175.

c. Average expenditure per person---$50.68.

d. Total expenditure---$8,869.00.

Public Welfare ---1940 *

a. Number of Brava cases---39.

b. Number of persons represented---152.

c. Average expenditure per person---$42.18.

d. Total expenditure---$6411.36.

*(Note---These figures do not include the greatly increased Federal Aid; stamp plan, surplus commodities, etc.) If part of the money appropriated for welfare could be used to sponser such an adult program, the results would well be worth the time and money expended since gradually the

number of welfare cases among the Bravas would be lowered. Over a period of years the Brava group, which constitutes approximately 40 % of the total population, would be better qualified to earn a living, improve their living conditions and render valuable services as citizens of Marion, Massachusetts.

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